Experiences in People Led Development

Promoting Food Sovereignty and Agroecology in Asia

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This publication is dedicated to our communities who shared their stories, and who continue to struggle and aspire for meaningful change. May they inspire many more.

TABLE OF CONTENTS

Foreword
- Hermann Rupp 7

Process behind the document
- T M Radha and KVS Prasad 8

Radically transforming food systems through people's food sovereignty and people led agroecology
- Ilang-ilang Quijano, Terence Lopez and Diana Bando 11

Building a community of practice on People Led Development for food sovereignty
an overview of People Led Development in APEX
- Elizabeth Cruzada 17

Communities revive and strengthen *Jara-Kurwa* system
- Rohan Mukerjee 22

The *Patikim* Festival
celebrating farmer led and people centric action
- MASIPAG 35

Protecting livelihoods through people led movement
- Frans DS Sani Lake 41

Transformation through empowerment of tribal communities
- Kiran Waghmare 50

Community Enterprises
key to development and empowerment of communities in floodplains
- Sakiul Millat Morshed 58

Revival of traditional farming
through PLD approach
- Fr. Alphonce Toppo 68

Revival of *Baumo* through community led action
■ Nurbaya Zulhakim 79

Promoting agroecology through traditional leadership
■ Keshabraj Ghimire and Krishna Thrau 87

Towards achieving food sovereignty
■ SDSS 93

Building seed sovereignty
■ Zahoor Joya 99

Shifting towards agroecology
a group farming initiative
■ Shankar Kumar Paudyal 107

People Led Development approach
a journey of mutual learning
■ Caritas Da Lat 114

Revival of uncultivated foods
■ Pavel Partha 121

Rural women as enterpreneurs
restoring food systems and creating markets
■ Chathu Sewwandi 126

List of Contributors 133

Foreword

For more than 60 years, MISEREOR has been closely cooperating with its partners around the world to find ways of supporting marginalised and impoverished people in their constant struggle to sustainably improve their living conditions. The maxim of "helping people help themselves" has been at the core of MISEREOR's work ever since its inception. It is still equally valid and relevant today. From the beginning, however, it has been a challenge to find ways of providing this assistance effectively and as a starting point for sustainable processes. It soon became apparent that it is not expedient to analyse problems and develop solutions from the outside; the participation of the local people is indispensable. But what does "participation" mean? How can it be organised appropriately? These questions have given rise to numerous discussions, analyses and experiments. Only over the past two decades, the realisation has dawned that it is not enough to let the people participate in their own development. They ought to take centre stage. They ought to decide about the "what" and the "how". Only they can adequately analyse the complexity of their living conditions and derive solutions from this analysis. External facilitation might be helpful to ensure that the local people whose lives were previously marked by discrimination, poverty and the constant struggle for survival are ready for this process. This facilitation must be based on mutual respect and appreciation, enabling all involved to meet as equals. What is more, it needs to focus on people's potential, not just their problems. The facilitation of Participatory Action Research (PAR) has proven to be very helpful for starting at the people's current situation, making them realise their potential and accompanying them into a better future. Besides facilitating the process, it is also imperative to enable the people to access expert knowledge, external information and further resources.

In the Asian context, MISEREOR and its partner organisations call this approach People Led Development (PLD). PLD is not a clear-cut approach, but it observes a distinct set of principles. These can best be described as a respectful attitude that enables cooperation on an equal footing and the promotion of people's potential.

For more than seven years, MISEREOR partners and representatives of local communities from all over Asia have been sharing their experiences with each other and with MISEREOR. The aim is to reflect upon, breathe life into and constantly refine PLD processes. The ultimate goal of this endeavour is to enable a socio-ecological transformation that offers all humans the prospects of equitable participation and a life of human dignity.

On behalf of MISEREOR, I would like to thank all of you who have contributed to this book. Thank you for creating an atmosphere of mutual trust and respect within the APEX exchange platform. This spirit of partnership is also evident in the stories told in this book: stories of both successes and challenges; stories of PLD processes in their respective contexts. When reading them, it soon becomes apparent that there is no single "path to success". Rather, it is an ongoing process of trial and error or action – reflection – action.

I hope this book will encourage more people to embark on the sometimes exhausting but always rewarding adventure of PLD, and help us build a decent and sustainable future for all on this planet.

Hermann Rupp

Desk officer for Rural Development, Asia Department, MISEREOR

Participants working on the manuscripts during the Writeshop

Process behind the document

■ T M Radha and KVS Prasad

MISEREOR has been collaborating with Asian Peoples Exchange for Food Sovereignty & Agroecology (APEX) partners across Asia for over a decade, in strengthening and enhancing People Led Development (PLD) approaches. These are people's endeavours to define objectives and strategies and shape their change processes in a self-determined way. Partners from various Asian Countries like India, Bangladesh, Indonesia, Nepal, Pakistan, Phillippines, Sri Lanka practising the PLD approach across varied themes on agroecology, were involved. While some have been following this approach for several years, a few are still new to this. Overall, the results of these processes have been favourable.

It was critical to consolidate learnings, enable reflection as well as share with others working on similar issues. For this purpose, APEX collaborated with AME Foundation (India), in bringing out a new publication on their network partners experiences in PLD.

The process was initiated almost a year ago, during August 2022, starting with virtual preparatory meetings. It was Covid Pandemic times. Field visits and face to face meetings were not possible. Therefore, to initiate the process of documenting experiences, new processes were conceived and tried out. As a preparatory step, frameworks to help authors to describe their 'experience' were provided. The purpose of the frameworks was to a) organize information available b) analyse to understand what has happened c) draw conclusions. The whole exercise was meant that authors/ partners bring together all details describing a specific activity, a programme or a programme component at one place. In the present context it was about the PLD story they want to share.

Two online review workshops were conducted during September and October 2022. The objective was to review a few cases during each workshop, so that all the partners

Presentation of a partners' experience

A session on review of individual writeups

understand what are the potential gaps in each writeup and how they could be addressed. During these two workshops, 5 partners presented the information pertaining to their experience based on the frameworks given. Detailed feedback was provided on each section to enable the presenter to further work and improve. Some of the aspects highlighted during the workshop were inconsistencies in data/information provided, repetitions, unclarity with respect to quantitative and qualitative aspects, impressions and opinions taking precedence over facts. For some, it was not very clear about how to identify a 'PLD story' within the activities, results, impact and challenges. All these were dealt with, case by case.

At the conclusion of the online workshops, a guide for writing the draft manuscript for PLD stories was circulated. The guide clearly explained what each section should contain like need, chronology, strategic shifts etc., and the focus area of their story. Some tips were provided as to how the basic manuscript has to be prepared.

A 4 - day 'Writeshop' was organised in Nepal during the end of November 2022. The Nepal Workshop was conceived as a 'writeshop' where all participants were expected to come with their first draft/manuscript. The participants came well prepared based on the clear instructions given by the organisers to bring along the following – a writeup; relevant data pertaining to the experience in data sheets; reports – progress, annual, field reports, if any; context maps and details; cases and relevant photos, and a Laptop for online working.

The first session was – 'Stock Taking Exercise' where each participant mentioned on a brown sheet displayed in the Workshop room - the current status of their manuscript. This was maintained as a progress indicator till the end of the workshop. The next session was a 'Brainstorming Exercise'. Each participant wrote on the flash cards what they individually perceive as the purpose of the book; for whom it is meant and why. The brainstorming session helped participants to reflect on the purpose of the book and documentation process, collectively. Further they recognised how crucial the book is for their own learning as an organization; how important sharing in public domain is to influence change processes; and telling their story with reasonable clarity and passion and recognizing that everything need not be told which in turn dilutes the message itself.

The third session was to observe how 'Diverse Perspectives' emerge when each participant reads a manuscript prepared by another partner. Initially, each partner/author was told to write the message of their own writeup. Later, participants were told to read, reflect on another partner's story and write on card what they perceived as the main message of the story. At times, it was hilarious that the message as meant by author was not being perceived by the reader. The purpose of the session was to show how the same text can evoke different

responses from different people.

The next two days were devoted for reviewing individual write-ups. The manuscripts were projected on the screen in the plenary. Comments and feedback was given on each paragraph. Here the facilitators and participants brought in their rich experience on development issues, ecological agriculture, technical and social processes. Guidance was provided with regard to adding humanistic and transformative elements, to make the story interesting. The process was strenuous but rewarding for all development enthusiasts to learn more deeply about each other's experience while making their own stories very focused. Based on the discussions, the partners further worked on their manuscripts making them more complete and purposeful.

The 4th day was focused on sitting with each participant bilaterally to examine the improvements they have made in their revised texts. This was followed by providing some cognitive inputs through presentations by editors on 'Effective Writing', for enhanced understanding.

Though the stories were different and diverse, the common underlying principle of community centric and community led efforts stood out. The collective wisdom of the group helped in understanding the relevance as well as taking pride in one's own work as well as appreciate and learn from other's experiences.

A number of individuals have contributed immensely in enriching this process. Ms.Elizabeth Cruzada, MISEREOR Consultant, who has been guiding the PLD process in the field, has been passionate about bringing out this document and has initiated and steered the process. She has also provided the donor perspective to PLD. Mr. Rohan Mukherjee along with Ms. Elizabeth Cruzada has coordinated with the LEISA India team in bringing out this publication. The Book committee members coordinated with the partners and ensured that all the partners submit their final drafts. The LEISA India team of AME Foundation have facilitated both online and offline workshops. They have worked rigorously on the drafts provided which involved besides editing, rewriting the intent, reorienting the text, resequencing the content based on interactions during online and Nepal Writeshop.

An outcome of an elaborate participatory process, this document reflects the innovative spirit of the communities, the ability of the partners not only to facilitate such processes but share it effectively to help those interested in such people-centered processes.

Seed exchange in Bangladesh

Photo Credit: BARCIK

Radically transforming food systems through people's food sovereignty and people led agroecology

■ Ilang-ilang Quijano, Terence Lopez and Diana Bando

Recent events such as unprecedented climate catastrophes, food price inflation, and the COVID-19 pandemic have laid bare the extreme vulnerabilities of rural people in the Global South to multiple planetary and human rights crises. Hunger, pollution, biodiversity loss and climate change have all escalated with no respite. Even as pandemic-related restrictions have eased, the burdens of small food producers have not. Truth is, it is folly to expect any meaningful change in this situation without a radical transformation of food systems.

Neoliberal policies have stunted genuine rural development in the Global

Seed exchange at Bayambang, Pangasinan during the regional workshop of APEX

South for decades. Food and agricultural systems have been designed—and are still constantly controlled and manipulated—to serve the needs of profit-seeking global markets and corporations instead of the people. The quest for People Led Development in rural communities is thus intricately connected with ongoing struggles for people's food sovereignty. Without rural people asserting the power to shape and determine their own food production and policy, they will remain tied to the dictates of a monopoly capitalist food system that works against their interests.

Since 2016, PAN Asia Pacific and MISEREOR have been collaborating to provide a platform of learning and exchange for rural peoples' movements, grassroots organizations, and NGOs working for people led development towards food sovereignty. The Regional Learning Exchange on People Led Development towards Food Sovereignty in Asia (RLEP), which ran successfully from 2017 to 2019, eventually led to the formation of the Asian Peoples Exchange for Food Sovereignty and Agroecology (APEX). Through strengthening learning exchanges and initiatives for shared advocacies, APEX capacitates rural people and advocates working towards food sovereignty and agroecology, with People Led Development as its guiding core principle.

People's food sovereignty and people led agroecology are two interconnected approaches that offer alternative and holistic solutions to address the economically unsustainable and environmentally destructive dominant food systems. They are two of the Four Pillars of Food Systems Transformation that PANAP helped popularize during the Global People's Summit (GPS) on Just, Equitable, Healthy and Sustainable Food Systems in 2021. The GPS was a Global South-led counter-summit to the UN Food Systems Summit. With big agri-food corporations dominating the agenda under the guise of "multistakeholderism," the UNFSS was a clear manifestation of increasing corporate control of the UN system. Two years later, the UNFSS continues to tread a controversial path, claiming to lead efforts at "food systems transformation" while setting up the stage for even greater corporate takeover of all aspects of our food systems, including the increased plunder of lands and other natural resources, financialization and speculation in food and farming, and dependency on hazardous agricultural technologies.

The climate crisis plays a key role in the agenda to consolidate corporate control over food and agriculture. Industrial capitalist agriculture contributes to around one-third of greenhouse gas emissions (GHGs)—through deforestation, overproduction, long-range transport of food, soil degradation and the heavy use of chemical fertilizers and pesticides derived from fossil fuels, among others. Yet, the same agri-food corporations that are responsible for GHGs are at the forefront of selling harmful, unjust and false "solutions" that will only worsen the climate crisis—through, among others, the expansion of biofuel plantations, unproven techno-fixes and the expansion of carbon markets that not only distracts from the need to phase-out fossil fuels but also facilitates land grabbing.

APEX Partners visiting trial farm of MASIPAG People's Organisation in Bayambang, Pangasinan

According to research by PANAP covering 32 projects, millions of hectares of land are being allocated to so-called "nature-based solutions" to climate change—this includes 1.3 million hectares for biofuels, 1 million hectares for carbon credits, 719,000 hectares for green finance, and 451,000 hectares for conservation. These projects threaten to displace small farmers and indigenous peoples under the veil of addressing the climate crisis.

It is in this context of relentless onslaught on rural peoples' rights and welfare that we must understand the importance of asserting people's food sovereignty. People's food sovereignty is "the right of peoples, communities, and countries to determine their own production systems related to agricultural labor, fishing, food and land, and associated policies which are ecologically, socially, economically and culturally appropriate to their unique circumstances." This is the definition put forward by the People's Coalition on Food Sovereignty (PCFS) in the 2004 People's Convention on Food Sovereignty in Dhaka, Bangladesh, which PANAP helped organize. Food sovereignty emphasizes "active resistance against corporate domination and other threats." As the convention further states, "Food Sovereignty is the power of people and their communities to assert and realize the right to food and produce food, and fight the power of corporations and other forces that destroy the people's food production systems and deny them food and life." This means that any struggle for people's food sovereignty must be anchored on understanding the historical culpability of agri-food corporations and imperialist powers in rural maldevelopment, and the destruction of local food systems, particularly in the Global South. And that people led development necessarily serves to strengthen the power of communities to determine their own production systems.

APEX farmers visiting MASIPAG's national backup farm in Nueva Ecija

APEX partners visiting trial farm of MASIPAG People's Organisation in Bayambang, Pangasinan

Photo Credit: Tey Lopez

Agroecology, meanwhile, is a holistic approach to sustainable agriculture and food systems. Beyond its biophysical and ecological aspects, we look at agroecology as being firmly grounded on the environmental, social, cultural, economic, and political dimensions of sustainability, as defined and outlined by the Pesticide Action Network (PAN) International and CIDSE. For PAN, in particular, it is the only viable solution to replacing Highly Hazardous Pesticides. Pesticides are estimated to poison around 400 million farmers and farmworkers each year, or almost half of the global farming population. It is a major driver of biodiversity degradation, linked to the deaths of pollinators and other organisms crucial to food security and the functioning of ecosystems. The movement for people led agroecology emerged as social movements challenging these devastating health and environmental harms of industrial agriculture. Movements embraced agroecology as one of the important components of food sovereignty and the peoples' right to healthy and culturally appropriate food.

Agroecology is characterized by the integration of science with local and indigenous knowledge and practice. Unlike the techno-fix approach of agrochemical corporations, people led agroecology emphasizes farming in harmony with natural cycles and processes. Using the political approach of food sovereignty, farmers, agricultural workers, community-based processors, and consumers are at the center of decisions. People and communities are part of the agroecosystem, not just as passive receivers of technologies. It promotes soil health, biodiversity and ecosystem function as the basis of food production. In contrast to monocultural systems that are inherently unstable, agroecological systems are complex and thus highly resilient, not just to the stresses of extreme weather disturbances and climate change but also the stresses of external market shocks such as those we experienced due to COVID-19 and the war in Ukraine.

Mobilisation of Munda community, farmers, fisherfolks, and the youth on safe food security in Satkhita District, Bangladesh

Photo Credit: BARCIK

Agroecology and food sovereignty are crucial in strengthening local food systems—a key goal for communities engaged in the process of People Led Development. Local food systems that are just, healthy, equitable and sustainable reduce undue dependence on globalized supply chains. This, in turn, minimizes the overall environmental impact of food systems. Local food systems also create economic opportunities by supporting small-scale farmers and local businesses. Emphasizing local production for domestic consumption ensures that food is grown to suit regional climates and ecological conditions, enhancing crop diversity and resilience against climate change impacts. In sum, People Led Development that integrates agroecology and food sovereignty provides a transformative path towards sustainable and localized food systems.

APEX and its members work in different levels and capacities to embrace agroecology and assert people's food sovereignty. It is a process that continuously evolves as a dynamic dialogue between farmers, scientists and social movements to influence their various practices and understanding. Despite the numerous challenges they face, APEX partners continue to exchange experiences, knowledge and practices that contribute to the overall strengthening of rural peoples' movements for radical food systems transformation. In this book, APEX leaders and organizers tell their stories of upholding food sovereignty and agroecology amidst some of the greatest threats posed by corporate food systems.

Landlessness and land grabbing

Landlessness due to monopoly control over land remains the biggest issue farmers and other food producers face in Asia. Global land monopoly has worsened to the extent that only 1% of corporations control 70% of farmlands. Governments fail or refuse to implement genuine land reform that will give farmers ownership and control over the land they till. At the same time, they

fail to protect rural communities from the land grabbing of local elites and transnational corporations. Most of the time, national laws and policies make it easier for land grabbers to take over vast tracks of agricultural lands, leaving farmers and their families robbed of their livelihoods and displaced from their homes.

Farmers and advocates during the national level food sovereignty training in Nepal

As shared by JPIC Kalimantan in this book, out of 15,000 hectares of land in the Kalimantan region in Indonesia, the government and corporation turned 12,000 hectares of land into large-scale oil palm plantations and gold and coal mining. As mining and plantation industries took over their lands, farmers and their families were forced to abandon their traditional farming practices and work instead in these industries. In response, the organization started working with local communities affected by land grabbing and extractive activities to protect their lands, forests, and seeds. It facilitated activities such as area mapping, which helped in defining administrative boundaries and avoiding land annexation by other parties. JPIC Kalimantan also conducted trainings and workshops on human rights and legal mechanisms that will help indigenous communities assert their land rights in Kalimantan.

Meanwhile, in Sri Lanka, farmers in the Monaragala district have become laborers in their own lands, as foreign corporations and the government agreed to convert farmlands into sugarcane plantations, prohibiting farmers from cultivating food crops other than sugarcane in these lands.

The Vikalpani Women's Federation started resisting this direct assault on food sovereignty by launching agroecology training programs where its members meet monthly to plan and discuss how to take control of food production. By 2016, Vikalpani had trained 50 women farmers using various agroecological practices such as pest management, land preparation, organic input preparation, crop management, and post-harvest management. Some eventually became agroecology trainers in their local communities. Thus, they in turn, became more empowered to assert their rights, including the right to land.

Loss of traditional knowledge and practices

Experience from the region has shown that landlessness and land grabbing often results in farmers and rural communities losing their traditional knowledge and practices in land cultivation and food production. They are forced to replace their methods with conventional farming and rely heavily on chemical inputs.

In embracing agroecology and food sovereignty, however, many farmers working in APEX member communities have started to go back to their traditional farming practices, recognizing how they are more beneficial. For instance, through trainings and workshops of Karunya Trust, the tribal

Community organisers and leaders' discussing the issues and challenges relating to food sovereignty and agroecology during the PLD workshop in Nepal *Photo Credit: Tey Lopez*

communities of Katkaris and Thakurs from Maharashtra, India, were motivated to revive the use of local seeds, manure and organic pest repellents. Dependency on external inputs was reduced, allowing the tribals to spend more resources on developing local markets for their produce while preserving indigenous seeds.

Meanwhile, in Bangladesh, BARICK conducts farmer-led research, conservation, and protection of uncultivated plant species, a source of nutritious and locally-available food that is increasingly under threat due to climate change and chemical agriculture.

Climate crisis and environmental degradation

Agroecology not only enables local and indigenous farming practices to flourish but is also proving to be one of the people's best protection against the devastating impacts of climate change. Rural communities that rely on functioning ecosystems for their lives and livelihoods are most heavily affected by climate change. According to Food and Agriculture Organization (FAO), from 2008 to 2018, the economic loss in Asia alone due to climate disasters accounts for USD 49 billion. In concrete terms, these are countless livelihoods destroyed and lives lost in poor and vulnerable countries due to a crisis for which rich and powerful countries are primarily responsible.

In India, for instance, the indigenous communities of Paharias in Godda district, Jharkhand, are experiencing changes in rainfall patterns and drought-like conditions, forcing communities to alter their cultivation practices. Increasing pest infestations have also been observed, leading to heavy harvest losses.

Instead of using even more chemical pesticides (and reinforcing the toxic pesticide treadmill) to respond to the problem, APEX member Keystone Foundation, together with the Paharia community, created the Ecological Calendar. The Ecological Calendar describes the weather, seasons, climate conditions and livelihood of the indigenous communities to help them make informed decisions about managing their areas. It also helps in documenting and understanding the impacts of climate change on traditional agriculture practices, wild foods and other social and ecological consequences—the first step in the people led process of finding solutions.

The stories in the book show that through people led agroecology and peoples' food sovereignty processes, resilient, culturally rich, and ecologically sound food systems that prioritize the well-being of people, respect nature's boundaries, and ensure food security for present and future generations can be built. Empowering local communities to exercise control over their food systems and define their own development can radically shape the future, not just for rural people but for all of us who owe the food on our tables to these communities struggling to be truly free.

PLDP

Participants of the Women and Youth Leaders' Forum in South Sulawesi, Indonesia, May 16, 2023

Building a community of practice on People Led Development for food sovereignty

an overview of People Led Development in APEX

■ Elizabeth Cruzada

For civil society and development organizations, enabling ownership and sustainability are paramount, which raise several pertinent questions: how can people be at the centre and be the primary actors in determining their own change processes? how can development projects trigger and support local communities' initiatives in addressing multiple issues, be it their environment, agriculture and economy, and social and political structures?

Often, sustainability is compromised when development projects, with all their expert-defined goals and set activities, make people become "project-oriented" or "project-dependent". This results in insufficient recognition of the true community interest and insufficient initiative to sustain changes after the project life.

Based on these development insights, MISEREOR partners in Asia have taken up steps to reverse this predicament, through "unlearning" their academic and "expert" biases while learning from the people. By partners' efforts of promoting community leadership and ownership, the communities have become much more confident and active in addressing their needs and asserting their rights, practicing what is now called People Led Development (PLD).

From 2017 to 2019, some of these MISEREOR partner organizations, from ten countries in South and Southeast Asia, came together, reflected on their learnings in the initiative called the Regional Learning and Exchange Platform for Facilitating Change Processes towards Food Sovereignty, or RLEP. For three years, from 2017 to 2019, the partners met in 5 sub-regional week-long workshops, building up staff's necessary attitudes and skills as change facilitators, while beefing up practices and theorizing on the various aspects of Food Sovereignty and People Led Development.

Two years later, in 2021, in the middle of the worldwide pandemic, these partners came together again, this time joined by partners of the Pesticide Action Network of Asia and the Pacific (PANAP) and MASIPAG - who, together with MISEREOR, formed the consortium for the Asian Peoples' Exchange for Food Sovereignty and Agroecology or APEX.

APEX is an exchange platform that brings together non-government organizations and local community-based organizations, as well as regional and national networks, all working towards building and asserting food sovereignty, including rights to land, seeds, technology, protecting and regenerating their environments and recovering indigenous cultures and ways of life. As a platform, APEX seeks to strengthen the capacities of these movements through dialogues and exchanges on practices in agroecology, People Led Development and building social movements, as well as advocacy for policy reforms. APEX also facilitates building solidarity for campaigns on food-related policies at the national and international levels.

Both APEX and RLEP have helped in institutionalizing partners' reflections on PLD, agroecology and advocacy, impacting not only their programs, the communities they work with, but also the organizations' cultures, values, processes and decision-making.

This article tries to encapsulate the significant elements of PLD approach as it is viewed and currently practiced.

Principles and Transformative Elements of PLD

Each community forges its own PLD path or approach, based on its character, history, and context, and consciously evolves in time across changing conditions. However, there are some common principles and elements that characterize their practices:

People come first. People are at the center of development. They are primarily responsible for making decisions and actions, while managing their alternative solutions towards change. These include identifying and analyzing their priority issues, planning, implementation, resource mobilization and evaluation.

Ice-breaker activity led by Lugita from Bina Desa during the Women Leaders' Forum in South Sulawesi, Indonesia, May 15, 2023

Having the people at the center also means trusting and respecting the capacity and potential of the different marginalized sectors and groups in the community. More importantly, recognizing that they have different needs, capacities, knowledge and potential. Women and youth, especially, if provided adequate space, develop their abilities and contribute their creativity and innovativeness in making alternative solutions, and would play significant roles in the community initiatives.

The roles of NGOs and outside experts are primarily that of facilitators and catalyzers, accompanying the community during their phases of transformation. They also provide crucial support for building capacities and realizing potential of the communities, through technical inputs and widening perspectives on social, political, and environmental issues.

People build on knowledge by continuous learning from experience and practice, in the collective habit of Action-Reflection-Action (ARA). ARA helps the community to derive lessons from practice, as people assess and reflect regularly on their actions. The continuous learning from Action-Reflection-Action builds the confidence of the community to enable organizing action at various levels.

The community's awareness of the commonality of problems, their appraisal of resources and eventual arriving at possible solutions is helped through participatory processes like Participatory Action Research (PAR), and Participatory Learning and Action (PLA).

Addressing practical needs and strategic interests. This refers to addressing not only current concrete needs (such as food, clothing, shelter, incomes) but also addressing underlying community needs and issues. Actions become more strategic as people take on a longer-term perspective and adopt a systems approach rather than having isolated solutions on a piece-meal basis.

Building critical and transformed awareness. People's perspectives are changed when they are awakened from a dependent, passive state to becoming active citizens who are conscious of their rights and collective ability to bring about transformation of their conditions. Analyzing socio-economic and political realities from the perspective of the poor and marginalized, linking local issues to global trends, dissecting various laws and the impacts on the poor enhances a deeper understanding and raise people's commitment for change.

Bottom-up approach, capable organizations with engaged participation and leadership. People Led development can only work through organized groups of people who have clear objectives and structures where members can exercise their responsibilities and express their views; create capable and enabling leadership. Members' potential is developed through their active participation and taking up leadership in the various works of the organization.

A back-to-back Women and Youth Leaders' Forum in South Sulawesi, Indonesia strengthened the links between networks

Self-mobilization and sharing of local resources. A community takes its future in its hands when people mobilize themselves towards their self-determined goals, for instance, when they organize self-help activities, such as labor exchanges for farm production, savings and lending groups for household needs, set up their own seed and food banks and collective enterprises. The sharing of time, labor, money, knowledge, and experience builds up and strengthens community's solidarity and belongingness. It provides people the network of support that they need in carrying out alternative, non-mainstream solutions.

Peer learning, or farmer-to-farmer, community-to-community influencing and dissemination. Modern agriculture, starting from the Green Revolution, has made farmers passive consumers of technology and inputs. In PLD, this is gradually reversed by changing farmers' mindsets. They learn by experiencing the ways and benefits of agroecological practices. Advocate farmers, farmer-trainers, farmer para-legals, and farmer-organizers know the local situation best. They know from their own experience how farmers are impacted by modern agriculture, how farmers think and get convinced. They have an intuitive grasp of using experience and theory and in pacing the learning process, and are therefore the best guides.

In the same manner, surrounding communities learn from the lessons and benefits gained by the PLD communities and follow them.

Representation in government decision-making structures and advocating for rights and access to resources, favorable laws and measures. As people and communities come together and gain confidence in their accomplishments resulting in solidarity, they also succeed in being heard by government decision-making and implementing structures. They mobilize themselves to have favorable laws and regulations passed and/or disadvantageous ones scrapped or changed. They also mobilise collective action against companies who encroach on communities' and peoples' rights and resources.

Networking with allied groups and like-minded stakeholders. Those engaged in PLD also value networking and engaging in joint campaigns, to multiply their capacities in organization and in advocacy, and to broaden their spheres of influence.

Though the above mentioned are overriding principles, finally, partners define PLD according to their experience. The perspectives of some of the partner organisations about PLD process is presented below.

For **BARCIK, Bangladesh**, the main idea of People led Development (PLD) is that people are becoming active and capable to take full responsibility of their own development processes in their communities. PLD is not a new theory or method but a very traditional and common approach and practice of rural Bangladesh to solve problems and harness their potential for further improvements. It is a process of sustainable development, creating avenues to share and utilize peoples' views, widespread and sound knowledge, experience, practices, and resources for all issues relating to their own development. It has been proved that planning and implementation of activities are more effective under their leadership. **The Indonesian Learning Platform** (composed of SETARA Jambi, CAPPA, WALHI Jambi, JPIC Kalimantan, GEMAWAN, JPIC Ruteng, YAKINES and TANANUA), working on community-based sustainable resource management, sustainable agriculture and women's development, listed down the following elements as

Community organizers joined an APEX workshop in December 2022 in Nepal to draw out and collectively reflect on the transformative elements, principles and strategies for organising communities

most crucial in community transformation: Building of community capacities; Community's active management of natural resources; Community managing local potential (for livelihood and local economy); Keeping local wisdom; Community actively involving in development, starting from planning; Women's active involvement in decision making; Awareness of human rights (and rights as citizens). **Caritas India** says, we do not bring ready-made solutions to the communities, we always find solutions from the farmers.

Guided by a farmer-led or 'bottom-up' approach, **MASIPAG's** work puts farmers' needs, priorities and aspirations at the center, and implies an underlying respect for farmers' diverse knowledge and capacities. It is based on the firm belief in farmers' potential to overcome cultural and social biases and to transform themselves into dynamic agents of development, capable of mobilizing and transforming their communities and engaging directly with political and social institutions. **Social Work Institute (SWI),** Nepal, believes that the current global crisis affects not only marginalized parts of societies in the Global South, but, – at least in the medium and long term – all people as individuals around the world. There is a need to join forces to challenge the structures that block empowerment, self-reliance and self-determination within and outside communities. Only self-reliant communities who control their resources and participate in local decision-making process have the potential to create changes that go beyond the local project level. This can be best achieved by facilitating people led development processes. Open communication, peer learning and creating spaces for experiential learning are the important elements of people led development approaches. SWI sees development as a transformative process building on individuals and communities existing capacities, knowledge and potential. Development is a joint effort of communities, NGOs and donors working together to achieve locally owned visions and create together locally driven change processes. This means, SWI believes in 'working with' and not 'working for' people. SWI staff, alumni and partners initiate and facilitate development processes in a way that enables transformative energies through reflection, dialogue, and joint learning.

This book presents some of the APEX partners' stories and experiences in initiating and developing sovereign and sustainable initiatives in agriculture and food systems - in asserting, claiming, and defending for their entitlements and rights as citizens, as caretakers of their land and other resources. PLD significantly anchors their work, development processes and action.

Communities revive and strengthen *Jara-Kurwa* system

■ Rohan Mukerjee

People Led Development approach with its long term engagement process has the power to empower local communities. Collective action, a major positive outcome from this engagement, has resulted in communities in Sundar Pahari initiating activities towards reviving, strengthening and conserving their food system and the ecosystem as a whole.

Sowing a variety of seeds in Kurwa at Talakpara

The *Paharia* are one of Jharkhand's indigenous tribal groups. The *Paharia* people in the hills of Sundar Pahari, Godda district in Jharkhand, practice a traditional form of shifting cultivation known as the *Jara-Kurwa* system on the hill slopes. This involves cultivation of a variety of crops that include maize, a variety of millets, pulses, oil seeds and vegetables. They carried out 1-2 years of mixed cropping after which the plot is left fallow for the vegetation to regenerate. The forest ecosystems of the region supported and sustained the traditional cultivation practice of *Kurwa*. The ecosystem provided a wide diversity of wild food – making an invaluable contribution to their nutritional security (Box 1, Page 26).

During the last century, traditional agricultural practices of the *Paharia* people have undergone considerable change. In the 1960s, *Barbatti* (Cowpea) became commercially important. Traders from the plains encouraged the *Paharia* to cultivate this crop. This brought about a major modification in the shifting cultivation practices of the *Paharia* people. They started the practice of *Jara* which involved monocropping of *Barbatti* for one year, to meet market demand. For one year, they followed the traditional mixed cropping *Kurwa* cultivation for their subsistence requirements, after which the land was left fallow.

With changes in cultivation systems, the *Paharia* households, especially in the villages of Bada Paktari Panchayat, Sundar Block, Godda District, Jharkhand have been experiencing considerable changes and challenges with regards

Seed distribution for Kurwa sowing at Talakpara

to their food systems and agricultural practices. With increased focus on commercial crops, crop diversity has been affected. Many vital subsistence crops like little millet, finger millet and foxtail millet are gradually disappearing from the region. Introduction of rice through the Public Distribution System is resulting in a shift away from Maize and Sorghum which were traditional staples.

Increased intensity of cultivation is resulting in reduced fallow periods which brings with it reduced quality of forests as well as spread of invasive species like *Siam* weed. The weed has been suppressing native vegetation, thus negatively impacting the health of the ecosystem. Also, indiscriminate and uncontrolled fires are hampering natural regeneration. With increasing population and subsequent reduction in land available to each family, *Paharia* families are unable to leave the land fallow for more than three years in order to prepare it for *Kurwa.* As a result, there is a preference for leaving lands covered with *Siam* weed which enables carrying out of *Jara-Kurwa* with short fallows. However, this approach brings challenges of suppression of natural vegetation, decline in quality of forest fallows, negative impacts of soil quality and health, and subsequent decline in the viability and productivity of the *Jara-Kurwa* system. This decline in quality of forests and fallows is resulting in the associated decline in availability of wild and uncultivated foods and Non Timber Forest Produce (NTFP).

Scarcity of water too is one of the major challenges *Paharia* people face. Being rain fed with no access to irrigation facilities, they depend on streams and springs for water for farming. Besides climate change, changes in rainfall patterns has had significantly impacted the *Jara-Kurwa* system which is completely rain fed. Owing to delay in monsoons, the timing of various cultivation practices, starting from sowing have got altered, thus resulting in overlap of activities across *Jara* and *Kurwa*. Communities are shifting to broadcasting of seeds in *Jara*, from dibbling of seeds, resulting in more wastage of seeds. The region has also been experiencing an increase in incidence of drought like conditions. Besides impacting crops directly, owing to water scarcity, pest infestation is increasing, often resulting in loss of entire harvest.

Box 1: Shifting cultivation - *Jara-Kurwa* system

Jara cultivation involves cultivation of legumes in the first year of the shifting cultivation cycle. Cowpea, Rice bean and Velvet bean are primarily commercial crops that farmers have been cultivating. The *Paharia* people sell a majority of the production and keep only a small portion for self-consumption and for sowing in the next year. Unlike most forms of shifting cultivation *Jara* does not involve any burning of the cleared vegetation which is used as mulch and manure for the barbatti crop. *Paharia* people use *Jogi* – a long wooden stake usually made from Gurso Caeseria Elliptica; to dibble the barbatti seeds. Gurso wood is preferred as it does not lose its sharpness during dibbling. A day or two after the sowing, the men fell the large trees in the plot. Some valuable trees like Sal and Semul are left to be harvested later. The fallen trees are left in the plot for the plants to climb on. With advent of rains, the climbers' twine over the fallen wood and undergrowth and spread over them. *Jara* is followed by the traditional mixed cropping practice of *Kurwa*.

Kurwa cultivation - After one year of *Jara,* the *Paharia* people carry out the traditional mixed cropping cultivation practice of *Kurwa* in the same plot. Around March the fallen trees of the previous year's *Jara* are collected in clusters and burnt. However, this burning is very limited and much less than the burning carried out after felling of trees for stand-alone *Kurwa* which is carried out without one year of *Jara*. Prior to the arrival of the monsoon the undergrowth and shrubs are cleared and burnt as small heaps. The burning for *Kurwa* is very controlled and is not allowed to spread beyond the plot. Once the monsoon is in full swing, the *Paharia*s sow a variety of seeds on the cleared hill slopes. Currently the crops sown under *Kurwa* are *Gangi/Maize, Tur/Pigeon pea, Tialo/Sorghum* and *Kakro/Rice bean*. The men and women carry the seeds in gamchas tied around their waist and dibble the seeds using the *Jogi*. They use one hand to sow *Gangi/Maize* and *Ture/Pigeon pea* seeds and the other to sow *Tialo/Sorghum* and *Kakro/Rice bean* seeds. The minor millets like *Petge/Foxtail Millet, Batwa/Little Millet, Muto/Pearl Millet,* and *Kodme/Finger Millet* are scattered across the plot. They also cultivate a variety of vegetables, other pulses and oil seeds. The crops are then harvested as and when they ripen, usually from end of October to December. After *Kurwa,* the land is left fallow for the re-growth of vegetation and trees. While the fallow period varies, on average it tends to be 3 to 4 years.

Many of the *Kurwa* activities are carried out primarily by women. *Paharia* women find shifting cultivation to be particularly beneficial for them. Women led *Paharia* households are able to carry out *Jara-Kurwa* themselves in order to meet the needs of themselves and their families. They get their staples like maize and sorghum and pulses like pigeon pea and rice bean from *Kurwa* which helps meet the family dietary needs.

The initiative

In 2017, Keystone Foundation (Box 2), started working with the communities in Sundar Pahari, to support the community led efforts for the revival, strengthening and conserving their food system and ecosystem as a whole. Keystone Foundation, the coordinating and implementing partner of the *Using Diversity Network project* in Sundar Pahari, joined hands with Soumik Banerjee, an Independent Researcher. Soumik Banerjee, a practitioner of Agro-ecology & Indigenous Seed Conservation has been working with the *Paharia* community in Sundar Pahari for over 20 years.

Soumik Banerjee and Keystone Foundation have both adopted a community centric approach in their work with local communities. From the very beginning the *Using Diversity Project* adopted a participatory approach involving community leaders and villagers being in the forefront for strengthening and adapting the traditional *Jara-Kurwa* based system ensuring food sovereignty, livelihoods and ecosystem services.

The process

The initiative was built step by step, following participatory processes at each step.

Participatory Research was carried out even before the launch of the initiative, which involved documenting traditional knowledge for deeper understanding. This in turn helped in developing and implementing community led solutions and management practices. The study highlighted several aspects of the *Paharia* people.

The Agricultural Profile, showcased the major cultivation practices of the *Paharia* people, the interconnected practices of *Jara* and *Kurwa*; and *Potio Keta/Badi* (homestead plot) cultivation. Seasonal activity calendars, a crop list and documentation of festivals associated with agriculture were included in the profile. It highlighted the rich crop diversity of the *Paharia* people while

Box 2: Keystone Foundation

Keystone Foundation has been registered as a "Trust" under the Indian Trust Act in 1993. Keystone Foundation's mission is to enhance the quality of life and the environment with indigenous communities using eco-development approaches. Through its Networks programme, Keystone Foundation, recognises the important role of grassroots action where local communities are at the centre of all environmental and development activities.

The Using Diversity Network aims to promote agricultural biodiversity. It enables civil society groups and community leaders to revive and promote uncultivated foods and traditional mixed cropping systems in different parts of India. In Sundar Pahari, work on the ground has been championed by community resource person, Shri Surja *Paharia*. Surja hails from Chamdade village, is a farmer himself and has been working on a variety of initiatives and interventions focusing on strengthening food systems of *Paharia* people.

also drawing attention to the loss and decline of several important crops, especially millets and some pulses. Further, it highlighted the challenges being faced by *Paharia* households with regards to their agricultural practices as well as interventions and potential strategies in mitigating these challenges.

An inventory on the Wild Food of the *Paharia* people was prepared through a participatory research with *Paharia* men and women in Bada Palma, Ghagri, Porkhani, Gadsingla, Tatakpara and other villages of Sundar Pahari. It was also based on the ongoing research of Soumik Banerjee. The study highlighted different wild and uncultivated food varieties, their consumption patterns, current availability, threats and challenges.

An Ecological Calendar was prepared which linked the seasons, climate/ weather, to events in nature, life and livelihoods of the communities. It highlighted experiences of communities who live in close proximity with nature. In a sense, communities sense the pulse of the environment - Ecological calendars essentially help in capturing this pulse. Documenting the calendars helped generate education material for the communities to make informed decisions about managing their areas. Also, it helped in understanding the impacts of climate change on traditional agriculture practices, wild foods and social and ecological consequences in the region.

A series of community meetings, consultations and awareness programs were conducted. This helped in sharing findings, spreading awareness and mobilising the community to come together to revive and strengthen their traditional agricultural practices, food systems and natural resource management. Community leaders played a critical role. In addition to Surja *Paharia*, many community leaders like Jaleshwar *Paharia* from Telo, Patras *Paharia* from Chamdade, Jawri Paharin from Nathgoda, Sri Kumar *Paharia* from Porkhani and Leta *Paharia* from Ghagri came forward to build community support.

Box 3

Chandi Paharin who belongs to the *Paharia* community is an elderly widow residing in Tatakpara village in Sundar Pahari Block of Godda District. She was married at a very young age of 12 to 13 years. After her marriage, she shifted from her home in the neigbouring village of Gadsingla to Tatakpara. Ever since she shifted to Tatakpara she has been actively involved in the carrying out of the traditional *Jara-Kurwa* agricultural practices of the *Paharia* people. While Chandi lives with her son Francis who is a member of the Police Battalion she proudly shares that she still carries out *Jara* and *Kurwa* herself. With the commencement of the monsoons, Chandi can be found in her family's *Kurwa* plots facilitating community sowing of maize, sorghum, rice bean, pigeon pea and a variety of other millets and vegetable crops. After harvesting, she carries out winnowing, threshing, pounding, grinding and other activities associated with the processing of the harvested crops. Finally, she dries and stores grains and seeds for future consumption and sowing. Maize cobs are hung over the cooking area in her family's common kitchen while other crops are stored in traditional seed containers called *Kurchi* or in sacks. The traditional shifting cultivation-based practice of *Kurwa* allows women like Chandi to facilitate and carry out all activities themselves without having to depend on men. This makes it possible for women led households to meet the food, nutrition and livelihood needs of themselves and their families.

Meeting with local communities at Bada Palma

Wild foods on display at Ghagri mela

Food festivals

Larger area level events were organised to highlight the diverse foods of the *Paharia* people. These events served as a platform to raise issues and evolving common solutions. On the 29th of November 2017, a Wild root and Tuber Festival was organised at Ghagri village. A tribute to the rich diversity of the forests of Sundar Pahari, the villagers put up 21 different roots and tubers on display at the Mela. The events involved exhibits of traditional crops, seeds, wild foods, traditional dishes; traditional games, activities and cultural performances; songs, speeches, and discussions on a variety of issues with a primary focus on strengthening traditional agricultural and natural resource management and conservation systems.

Ever since this first event, annual events celebrating the food systems of the *Paharia* people have been organised with the community themselves taking responsibility for organisation of the events. In 2022, a Traditional Food Mela involving over 300 *Paharia* men, women and children was held in Rakha village. The main attraction of the event was a display of traditional food items and forest produce used by the *Paharia* people. *Paharia* women from across the area took responsibility for organising the exhibition. 146 women from 11 different villages brought a variety of different items for display which include wild tubers, green leafy vegetables, fruits, flowers, seeds, honeycombs, mushrooms, thatch grass, broom grass, datun (chew sticks). The rich diversity of agricultural and horticultural produce of the *Paharia* people was also on display and this included pulses, cereals, millets, maize, jackfruit, custard apples, bel, drumstick, and guava. The maximum number of items were displayed by the group from Bada Palma village who had brought 104 different items. The exhibition helped facilitate a transfer and sharing of knowledge regarding different foods and forest produce used by the *Paharia* people in different villages across Bada Paktari Panchayat and also highlighted some of the food items and forest produce that are becoming increasingly rare thereby drawing attention to the need for conservation and restoration efforts. After everyone had explored the exhibits, the women boiled the wild tubers they had brought and shared it with those present.

These events have been helping build a sense of pride among the *Paharia* community for their traditional food systems, spreading awareness about the challenges being faced, to mobilising men, women, and youth to come together to collectively address the challenges they are facing.

Revival of traditional crops

In 2018, traditional seeds like foxtail millet, finger millet, pearl millet, little millet, Job's tear, pigeon pea, and velvet bean were distributed to 96 farmer families. Traditional seeds were also made available through community seed exchanges within the *Paharia* community as well as with other communities like the *Baiga* of MP and Chhattisgarh and the *Pahari Korwa* of Chhattisgarh.

The number of farmer households who have revived traditional crops has steadily increased to 550 farmer households in 2022. Some of the crops which did well include *Petge* (foxtail millet), *Muto* (pearl millet) and *Garari* (Job's tear). In addition, 250 farmer households are cultivating a diversity of vegetable crops in their homestead plots.

Forest Gardens

To increase the productivity and sustainability of *Jara-Kurwa system*, a Forest Garden initiative was launched. Forest Gardens are being developed through cultivation of shade tolerant crops like *Haldi*/ Turmeric (*Curcuma longa*), *Adrak*/ ginger (*Zingiber officinale*), *Kesor Alli* (*Pachyrhizus erosus*), *Kachu*/ Taro (Colocasia esculenta), and *Ol*/ Elephant Foot Yam (*Amorphophallus paeoniifolius*). These are being cultivated in the forest fallows to stop the invasive *Siam* weed infestation, enhance biodiversity and generate additional livelihoods. Further, the forest gardens are a rich source of a variety of wild and uncultivated foods like green leafy vegetables, tuber, fruits and mushrooms. The fallows are closed for grazing and protected from fires.

PAR exercise at Ghagri village

In the year 2018, pilot forest gardens were established in the forest fallows by community resource person, Surja *Paharia* in Chamdade village. In the next year, 2 more Forest Gardens were established by Leta *Paharia* from Ghagri and Jawra Pahari from Telo. Currently, in 2022, there are 20 Forest Gardens. Farmers are sharing their experiences and encouraging fellow farmers to establish Forest Gardens in their lands.

Guided Fallows

Addressing challenges being faced in the first year of the fallow period, an initiative known as Guided Fallows is being piloted in *Kurwa* plots of *Paharia* farmers. In the new fallows, Velvet bean, Jack Bean and Sword bean are being sown. This is like live mulching. The aim is to reduce invasive species, promote conservation of moisture, create a suitable microclimate for microbial action, improve soil structure and texture, maintain soil pH, prevent soil erosion, protect soil biota from UV and Cosmic rays, replenish water table, reduce excessive heating of soil or deposition of salt in top soil. A pilot guided fallow was established in the village of Chamdade in 2018. Currently, in 2022, there are 11 Guided Fallows in place.

Strengthening PLD approach

As the initiative progressed, the People Led Development (PLD) approach was further strengthened through capacity building events and PAR exercises. Exposure visits were organised for the community resource persons to learn practices and strategies being implemented by communities like them in other parts of the country. For instance, community representatives participated in the annual Using Diversity Network meeting held in Hasanur, Nilgiri Hills, Tamil Nadu.

To strengthen collective action and strengthen the PLD process, a PAR exercise was carried out in 2021, as part of an APEX network initiative. The exercise involved representatives of different sections of the *Paharia* community (women, men, youth, and elders) from 4-5 villages. The participatory exercises involved exploring changes in food production, identifying sources of food, challenges with respect to different agricultural practices, livestock, wild and uncultivated food and other forest resources. The issues and challenges being faced by the *Paharia* community were identified which need to be further addressed.

To facilitate Community based monitoring, a training program was conducted in July 2022 on 'Barefoot Ecology', monitoring for climate change and gender based approaches. Community resource persons and representatives are trained on monitoring water sources, climate and weather changes. This is helping in developing and implementing community led strategies and plans to address the impacts of climate change, environmental degradation and to practice improved agricultural and natural resource management strategies.

Mushroom harvested from Forest Garden

Forest nursery at Chamdade

Community ownership and Collective action

One of the key elements of the PLDP approach when working with the *Paharia* community was long term engagement. Soumik Banerjee and Keystone Foundation under the framework of *Using Diversity Network* have been playing the role of facilitators providing the community all needed support to understand and address the challenges they are facing.

The community has come forward to take ownership of the different initiatives and activities aimed at reviving and strengthening their traditional agricultural and natural resource management practices. Collective action has been a major positive that has resulted from this engagement.

The PLDP process has empowered communities to identify issues for themselves as well as to pursue solutions**.** Some of the community initiatives are highlighted here.

The villagers of Porkhani along with Keystone Foundation have successfully installed a Solar water supply system from one of the springs in the area. An area level survey of water sources is being carried out and initiatives to ensure provision of drinking water are also being undertaken.

Two Community Seed Banks (CSB) have been established with committees in place to manage the procurement, storage, distribution of seeds as well as return of seeds from farmers. An older community seed bank in Bada Palma village established before 2017 has been strengthened with a new CSB committee in place. A new Community Seed Bank has been set up in Bada Paktari village managed by a committee headed by Kali Pahari who has provided space in her house for the seed bank.

Two community nurseries of native species have been established in Chamdade and Bada Paktari to promote improved availability of wild and uncultivated foods.

Women boiling tubers at Rakha Mela

Training events were conducted by community members on making leaf plates and *Baans Soop* (Bamboo product for winnowing).

'*Jungle Bachao Abhiyan Samiti*' was formed by *Paharia* villagers and leaders who came together in Ghagri village under Bada Paktari Panchayat. This was formed based on discussions on how to promote community led forest protection and conservation and prevention of forest fires in the villages of Bada Paktari, Goradi and Kusma Panchayat. The committee has been holding regular meetings and awareness programs in villages of the 3 Panchayats. For example, Dharmendra *Paharia*, member of the *Jungle Bachao Abhiyan Samiti* from Bada Palma village, facilitated a discussion on major challenges facing the *Paharia* people with regards to forests and the need to revive traditional practices in safeguarding forests from fires. The programmes while involving men, women and even children use strategies like *Natak* (street plays) and local songs to spread awareness on the protection and conservation of forests. *Mahua* nets, made from sarees, were distributed for collection of *Mahua* flowers and to check burning, which is one of the drivers of forest fires.

Way forward

Keystone Foundation, the Using Diversity Network and the *Paharia* community of Sundar Pahari are committed to continue working together to strengthen traditional agriculture and natural resource management and conservation in the hills of Sundar Pahari and adjoining areas. Aimed at further improving forest gardens, other crops like Black Pepper and Giloy (a medicinal plant) are being explored and will be introduced from 2023 onwards. Community representatives will also visit other areas on exposure visits to explore and understand different interventions and initiatives being implemented by communities in other parts of India. There is also a plan to support the formation of a *Community Foundation,* comprising members from the *Paharia* community for addressing issues and taking up initiatives important to the *Paharia* people.

Display of harvested produce at Rakha mela

PLDP

The *Patikim* Festival

celebrating farmer led and people centric action

■ MASIPAG

When a community's wisdom and resources are respected and solutions identified within the community, the process of community empowerment becomes truly people-driven and people-owned. *Patikim* Festival, a true reflection of farmer-led and people-centric agroecological approaches, is more than just a celebration. It gestures towards building a welcoming and unifying community of farmers advocating for natural and organic farming in the Quezon province.

For Filipinos, the month of May is the month of festivals and thanksgiving for the Patron Saint of Farmers for their bountiful harvests. Adding to these festivals was another celebration called the *Patikim Festival*, initiated by members of PCBQ2 (Provisional Consultative Body of Quezon, a consultative body of MASIPAG) and held annually since 2013. *Patikim Festival* is no ordinary festival. It is an expression of gratitude of farmers to the organizations that helped them recover from the effects of typhoons Winnie and Yoyong in 2004. During this festival, people come together and share food, knowledge and practices as thanksgiving and to advocate for sustainable changes in their communities.

The festival is a true reflection of farmer-led and people-centric agroecological approaches showcasing organically produced products and cuisine such as rice cakes, local salad, lechon or roasted whole pig; cuisines cooked with coconut milk like sinantolan, fish ginataan and farmer bred rice.

Besides being a thanksgiving gathering, *Patikim* also serves as a platform to encourage more farmers in the Real, General Nakar and Infanta towns to practice organic farming and share information about the issues and challenges that the small scale farmers face. Members of PCB Q2 invite other farmers, members of the community, the local government unit and agencies, church, advocates and all those who want to partake. Chief Executives of Local Authorities are invited. They engage themselves besides sometimes hosting the events too. Thus, the Local Government Units (LGUs) of Real, General Nakar and Infanta are now supporting the members in each municipality.

The festival is an outcome of farmer's aspirations and action to be freed from the clutches of transnational corporations monopolising seeds and technologies. Besides organic agriculture practices and climate change issues, farmers discuss development aggression, inappropriate programs and policies, GMOs and pesticides.

"Our area is naturally hazard-prone due to its proximity to the Pacific coastline and is frequently being battered by strong typhoons, affecting our crops and livelihood. Organic agriculture has a huge potential to increase the resiliency of farmers, thereby increasing their ability to function even during disasters." said Virginia Nazareno of Kiday Community Farmers Association (KCFA).

More importantly, the festival showcases how communities address various issues to enable sustainable changes in their communities. Expressing solidarity and unity, the communities operationalize mutual and joint commitments towards advocacy, empowerment and rural development.

The spirit of volunteerism enabled by these efforts are complimentary not only in the field of agroecology but also in the social, cultural, and political realm. Here, the farmers not only become natural scientists or peasant scientists with the success of their self-sustained farms, but also become capable social scientists and people's politicians who can articulate what is needed to be lobbied and discussed with the duty bearers of their towns. Moreover, the farmers' experience as peasant scientists gives them the leverage to make their agenda more valid. Indeed, by 2015, PCB Q2 was successful in lobbying the municipality of General Nakar, Quezon to pass a municipal ordinance on organic agriculture and the banning of GMOs. Moreover, the mayor of the town has become a staunch critic of the GM crop Golden Rice. MASIPAG network has been campaigning against its commercialization in the country for years now.

It is noteworthy that these activities are carried out by the leaders and members themselves, with very little support from the staff assigned to the area. The practice of shared leadership and decision making is crucial in ensuring that the responsibilities are distributed among members and each have a role in the actualization of the plan and the activity. In the process, it is not just the festival that inspires people, but the act of benevolence, diligence and commitment of the members that led to the expansion of membership of PCB Q2 in nearby barangays and engagement of youth in the process.

PCB Q2 ensures that this festival takes place every year by including the date and preparation period in their annual plan. Each member organization commits to bring food, host the event and solicit support from government offices, churches or advocates. This spirit of volunteerism is inspiring each member to be more active in meetings, bayanihan activities and even mobilization. In the *Patikim* Festival held in early 2022, more than 200 people participated and enjoyed locally produced products.

Farmers, scientists and development workers during the historic BIGAS conference, 1985

Patikim Festival is thus more than just a celebration of the farmers' will to overcome impoverished conditions. It gestures towards building a welcoming and unifying community of farmers advocating for natural and organic farming in the Quezon province. It reflects truly a process of community empowerment becoming truly people-driven and people-owned.

Any such change requires institutional support and empathetic facilitation. This has been done by Provincial Consultative Body of Quezon (PCB Q2), one of the oldest and robust PCBs of MASIPAG. PCB Q2's PLD facilitation and farmer-led implementation process, aiming at systems change and genuine farmer and community empowerment, is described below.

PCB Q2 – the institution facilitating *Patikim* festival

Provincial Consultative Body of Quezon (PCB Q2) has been established in the month of May, 2006. It is located in the Northeast part of the province of Quezon and the Sierra Madre Mountain range where it covers the mountainous towns of Real, Infanta, General Nakar; as well as the five towns of the Polillo Group of Islands namely Polillio, Jomalig, Patnangugan, Panakuluan, and Bordeos. PCB Q2 is made up of organizations formed by the Prelature Social Action Center of Infanta, in collaboration with MASIPAG since 2005 after the tragedy caused by typhoons Yoyong and Winnie (Nov, 29, 2004) destroyed the farming communities, specifically in Real, Infanta and General Nakar.

The PCB Q2 has been supporting root crops in the upland areas and rice in the low land areas; processing of cassava and ginger surplus harvest into local delicacies for additional incomes for farmers; documenting farmer's practices on agroecology. Over fifteen years, PCB Q2 has built capacities of farmers to conduct independently their own technical and advocacy training on organic sustainable agriculture. Local farmers have categorized the climate of PCB

Farmer members of PCB Q2 organise a parade for Patikim festival

Farmer leader Darius Gurango speaking during 2018 Patikim festival

2018 Patikim festival

Box 1: About MASIPAG

On May 29, 1986, MASIPAG organization was formally started with a few dozen Nueva Ecija rice farmers, ACES (Agency for Community Educational Services Foundation) organizers and progressive academics from the UPLB (University of the Philippines at Los Baños). The basis for the MASIPAG partnership is to put a "radical belief in farmers" as shared by the late MASIPAG scientist Perfecto "Ka Pecs" Vicente. Currently, MASIPAG has nine programs namely CIMME, breeding, Development of Sustainable AgroEcosystems (DSAE), Farmer Developed and Adapted Technologies (FDAT), Farmers Training, Local Marketing and Processing Support (LMPS), Linkaging and Advocacy, Organizational Development and Network Strengthening (ODNS), and Climate Change Resiliency.

The basic unit of the network is composed of farmers' organizations, non-government organizations and scientists-researchers who are MASIPAG members at the provincial level. The Provincial Consultative Body (PCB) coordinates implementation of MASIPAG activities at the provincial level. Some of the PCB's roles include facilitating Farmer-to-farmer as well as multi-sectoral knowledge exchange; advising POs on organizational matters; advocacy for food sovereignty and farmers' rights; monitoring of developments and issues affecting small farmers and sustainable agriculture; educating and mobilizing farmers' communities; Building strategic and issue-based alliances with other organizations, local governments; guiding Farmer Guarantee Systems, organic standards, inspections, marketing etc. The end goal of PCB is empowering farmers and their communities through participatory processes and shared leadership for genuine rural development.

Q2 as "wet and very wet" with the occurrence of rain being observed all throughout the year, even during summer season (wet) and having its peak during the north-east monsoon (very wet).

PCB Q2 currently is a strong network of farmers organizations facilitating and leading the development of empowered farmers in sustainable communities. The continuous engagement of People's organisations and leaders is crucial to ensure their involvement in all activities and that their strength, knowledge and opinions are heard and processed to come up with a united/unified decision. (Virginia Nazareno, former Chairperson of PCB Q2 and now MASIPAG Chairperson). The reliance on each other is reflected in the types of leadership representation in the committees enabling strong program implementation.

Sustained expansion was done by developing deep and strategic relationships with local Government units, availing existing community hubs in COVID Pandemic and forging alliances with other NGOs and networks involved in similar campaigns. While strengthening various programme committees of MASIPAG Network, PCB Q2 has been recognised as one of the oldest and robust PCBs of MASIPAG network.

Convergence of farmer led action and PLD processes

Besides being a robust facilitating institution, PCB Q2 has been carefully nurturing processes of empowerment as a member of the MASIPAG network. Farmer empowerment is one of the core principles of MASIPAG network. It is therefore the essence of its programmes, processes and structures. MASIPAG, in fact, emerged as a partnership between farmers and Scientists after questioning the relevance of the Green revolution technologies and the lack of control of farmers over their own lands. A series of farmers-scientists

Utilising community hubs for organising meetings during the COVID pandemic

exchanges led to the emergence of this partnership (more details in Box 1, Page 39).

The 'intermarriage' started rough as both the farmers and scientists had to tackle their complex egos and intellectual dilemmas. Finally, equality and farmer empowerment through Farmer Led Action was institutionalized as a method of de-emphasizing differences in class and status of participants. Guided by a farmer-led or 'bottom-up' approach, its work puts farmers' needs, priorities and aspirations at the center, and implies an underlying respect for farmers' diverse knowledge and capacities. It is based on the firm belief in farmers' potential to overcome cultural and social biases and to transform themselves into dynamic agents of development, capable of mobilizing and transforming their communities and engaging directly with political and social institutions.

On the other-hand, according to Elizabeth Cruzada of the Asian Peoples Exchange for Food Sovereignty and Agroecology (APEX), **People Led Development (PLD)** is a collective process by which people (poor and marginalized sectors) commit and act to make changes in their lives and communities (and societies) to meet their needs and to address the conditions and causes of their disadvantage and marginalization. In development work, especially in the involvement of NGOs, PLD is when communities realize that their relationship with NGOs was empowering them if and only if NGOs work with them on an "exchange and sharing" and not on a "give-and-take" basis. When a community's wisdom and resources is respected and solutions identified within the community, the process of community empowerment became truly people-driven and people-owned.

Thus, based on MASIPAG's fundamental principles, operational convergence and synergies were created between PLD and Farmer-led Action processes.

Unlike the other top-down approaches, in both these approaches, communities identify methods that are most appropriate through meaningful relationships with academic and development institutions. These institutions are expected to support participatory ventures that will advance the community's capacity in governance and stewardship of their lands.

The farmer led *Patikim* festival illustrates spectacularly a paradigmatic shift in development process.

Protecting livelihoods through people led movement

Frans DS Sani Lake

Sustainable food, the basic need of the Dayak communities was threatened owing to large scale commercial plantations. In an effort to protect themselves and their livelihoods, communities came together and improved their knowledge and skills in various aspects of farming and on their rights and responsibilities. All this was made possible with the active support of JPIC which followed a People Led Development approach.

Central Kalimantan is a province on the Indonesian island of Borneo with a population of 2,702,170 and spread across 14 districts. Around half of the population belongs to the Dayak tribe and are scattered in almost all districts in the province of Central Kalimantan. The indigenous Dayak community in Central Kalimantan is a community of gatherers, river fishermen and cultivators. They also depended on the rubber incision. They lived in the midst of nature in peace and friendship, and live the values of 'Humabetang', namely mutual cooperation (gotong royong), togetherness and harmony.

Kalimantan is mountainous and hilly. There are swamps and peat on flat land. Farming is done on drylands. Forests are cleared and cultivated, to the extent that it serves the needs of the family. They plant other trees to maintain the sustainability of the soil and plants. In addition, they also plant rubber to meet market needs and family needs, after the rice harvest. In the following year they move to a new land, to maintain balance in nature. This method of cultivation has been followed from generations. Every 5 years, they return to cultivate the previous land with the consideration that it has turned into forest.

However, in the last 50 years, large-scale oil palm plantations and gold and coal mining, spread over 12000 hectares out of 15000 hectares in Kalimantan area, has left little land for agriculture and settlement. Also these industries resort to extractive and exploitative practices, resulting in pollution of soil and river water. There is deforestation and land grabbing.

Recurring land fires that reached a peak in 2015 became a turning point for policies towards land and forest management. Criminalization of members of the farming community is increasing, as they are being accused of land burning. Though totally dependent on farming, the community is afraid to open new fields. They are afraid of being arrested and jailed. Without farming and food production, hunger began to be felt in the villages. People's livelihood from fields and forests got threatened. Local seeds are almost gone. Farming culture is lost and the tradition of respecting nature is endangered. This impacted women the most. Women who were artisans and cultivators, now remained as housewives, in the absence of farming.

The coal industry and large scale oil palm plantations lured the local communities to work in the industry, to fulfil its labour requirements. In the absence of farming, there was large scale migration. So on the one hand there is reduced land, on the other hand farming habits were abandoned. This had a big social impact on nature and the indigenous people of Kalimantan.

The PLD approach and process

In 2010, JPIC Kalimantan started working in Central Kalimantan. As a grassroots organization, initially JPIC conducted an assessment of threats being faced by communities from extractive industry practices. The assessment was done in 24 communities spread in four districts of Central Kalimantan. It was found that 12 communities needed assistance. They were Kubung villages (Dayak Tomun – Lamandau Regency), Bangkal, Tanah Putih and Penyang villages (Tomuan Dayaks- Seruyan Regency), Pianggo, Tangkan, Matarah, Didi, Bentot, Janajari, Tewa Pupuh villages and Ampar Batu (Dayak Ma'anyan – East Barito Regency).

FGDs were conducted in each community to understand the threats and opportunities that the communities had and the potential of communities in resolving them. A need assessment was carried out in all the 12 communities

and it was found that the communities, who are mainly cultivators and fishermen, had primarily two needs - land for farming and access to healthy and sustainable food.

Together with the community, JPIC carried out an action plan in the field of agriculture using a traditional model. The main and important action plan is how the community continues the tradition of farming as a basic right of the Dayak people. And how this could be achieved without destroying the forest and keeping the seeds sustainable by following traditional practices. Action plan also included formation of farmer groups in each community which are recognized by the village government through a Decree; strengthening of farmer organizations; and promoting education and awareness on Law and Human Rights.

The implementation of the action plan was evaluated at the end of one year based on reflection of the activity's journey for one year. From the evaluation carried out, several inputs emerged which were embedded in the action plan of the following year. So, an ARA process was carried out at the beginning of involvement with the communities. Based on the process, JPIC Kalimantan facilitated the preparation of strategic plan both at the community level as well as at the organizational level, to jointly deal with the degradation of community livelihoods by extractive industries.

From planning to village program implementation, both men and women were involved. Women play an important role in Dayak community. There is respect for women, in the various roles that they have in family and community life. Besides their prominent role in the household, women have significant role in farming and community leadership. Some are group leaders, some are heads of village administration and some are traditional leaders (Kepala Adat) too. Participation of youth was also given enough attention, as they are responsible for the traditional knowledge and sustainability of the community in the future.

Area mapping

For generations, the Dayak people have owned the land but did not have any legal documents on ownership. They knew their land boundaries based on rivers, or rocks or large trees. To overcome the threat of land annexation by other parties, the community needed to have administrative boundaries to their lands.

To ensure tenure over the land, the community together with JPIC and its network planned a mapping of the village area and individually owned lands. It was first done in the village of Kubung, Lamandau district in 2011, followed by Pianggo village, Apar Batu village and 10 other villages.

Some community members received training in mapping the village and individual land boundaries. Men and women first mapped the village boundaries. Then the boundaries of each family's land was mapped. This mapping is also done to identify the plants that grow in these areas and those that have become extinct. The results of the mapping become village and family documents. They help in preparing action plans.

Building awareness on rights

There are human rights violations in the form of land grabbing and criminalization of land-owning communities. We noted that for 10 years there were 20 members of the community who were criminalized and imprisoned.

To protect community rights, JPIC Kalimantan conducts sessions on human rights, with the aim that the community understands what their rights are; the legal mechanisms; and, how they can protect their rights and help their community members. JPIC together with the network conducted a series of training events and workshops involving men, women, parents and young people. For example, one of the legally protected rights is the right to farm traditionally. Previously, the community was threatened by certain parties not to farm and prevent forest fires. However, there are local government regulations, namely Pergub No. 1 of 2020 which guarantees and protects the rights of traditional cultivators, with a land area of 2 hectares. With JPIC imparting awareness on such laws, communities continued farming, with confidence.

Some members of the community are paralegals who assist in various legal advocacy efforts to protect land rights and anticipate corporate criminalization. Each community has managed to prepare 2 paralegals to assist community members who are facing legal cases related to land and forest rights. They are quite proficient in negotiation and mediation skills. And, more than that, paralegals are quite capable in collecting data, analyzing cases and drafting lawsuits in court. The JPIC Advocacy team provides legal education and skills in handling cases.

Growing food

The local communities practise farming by cutting down a bit of forest, letting it to dry in the sun, and then burnt. The way they burn is by carrying out traditional ceremonies, praying and asking permission from the rulers of nature – the ancestors. Then they share roles in mutual cooperation to maintain the fire until all the dry leaves on the land are burnt. Then the land is cleaned and used for planting.To avoid intimidation from the police, community on the advise from JPIC, involved the local police on guard, while the piece of forest is being burnt. In the entire process, the traditional head and the local government are involved.

Men and women of Dayak communities play a significant role in farming

After clearing the land, the community selects superior seeds, especially of rice, after the priest or the traditional head offers prayers (See Box 1). Sowing and planting are done by community together. Some open the soil and some put the seeds and cover them with soil. They plant in turns based on a mutual agreement. For example, on the first day they do planting together in family A, the second day in family B, and so on until everyone gets a chance to be helped.

Some communities use organic fertilizers according to community traditions, while others use chemical fertilizers. JPIC Kalimantan took the initiative to introduce a model of organic fertilization and pest control, namely Eco Enzyme (EE). Eco-enzyme is a multi-purpose natural liquid. (See Box 2). Apart from liquid EE, they were also taught how to make EE compost. In this way, the community practises natural farming to maintain plant health, have a good impact on humans, climate and the surrounding ecosystem.

In six months time, the rice comes to harvest. They perform traditional ceremonies before the harvest, as a means of expressing gratitude to the Goddess of Rice. Men, women and children are involved in harvesting the fields. Rice that has been harvested is dried and stored in the barn. Some of it is used for household consumption, some of it is sold and some is stored for seed purpose for the following year's planting season.

After the harvest is done, the community holds a family celebration and even a community celebration. They call it the harvest festival. JPIC Kalimantan organized a Village festival, something bigger than the usual, in each village. In this festival, each member of the community brings their crops, both paddy and non-rice, to be enjoyed together. They always offer prayer of thanksgiving in accordance with traditional beliefs as well as a mark of respect to the rulers of nature, who are always friendly and provide abundant harvests (See Box 3, Page 47). Some people will share with the community, especially young people and children, about the natural wealth that exists, especially the types of local food rich in protein and are good for humans, animals and plants. The community feels obliged to protect the land, forests and water which are useful for life and for their sustainability.

Ten communities have continued farming activities for the last three years, with good results. The Bangkal and Penyang (Tomuan Dayak) communities could not continue farming as 80% of the land in these two communities is already occupied by large oil palm plantations. However, these two communities grow vegetables, raise chickens, rear fish and pigs as a source of livelihood to

Box 1: Prayer before planting rice seeds

To you Ibu Padi, thank you for giving us harvest and food.

We, the children of the earth, want you to always give us more abundant life. Therefore let us return you to the ground, to plant again for the next harvest.

But we also ask for help, mother earth, to take care of and care for the rice plants this year so that they are always healthy and free from pests and diseases. The gods who guard the land, forest and water, give protection and fertility of the soil to our rice plants. And, we promise to be faithful in maintaining and caring for the fields and forests around us, so that they contribute to providing good nutrition and healthy air.

May the mother of rice provide abundant results for our lives with our children and grandchildren.

Box 2: Eco Enzyme

Eco enzyme is prepared by fermentation of the following ingredients: Sugar (brown sugar / molasses) - 1 kg/gr: fruit or vegetable waste (fruit peels and fresh vegetable pieces) - 3 kg/gr: water (tap water, rain, waste water) - 6 kg/gr. Fermentation is made in a closed container and for 3 months before use.

Sowing and planting are done by community together

meet family needs. Traditional markets in Bangkal and Penyang are controlled by these two farmer groups.

Supplementary Income

To help women and youngsters in earning additional income, JPIC Kalimantan organised training events to build their skills, helped them to do value addition and find markets for handicrafts.

Trainings were organised on making rattan bags. Members of Kubung (Dayak Tomun) women's group, made school bags from Kapuak Bark, a type of wood that is peeled, dried and then sewn by hand or machine. JPIC helped them by providing machines and introducing better and more attractive sewing models for young millennials. The members of the women's group in Pianggo village too used rattan as raw material. Didi village women's group earned income by processing pork into meatballs which are of interest to young Dayak people in East Barito.

Women campaigned for state recognition of local seeds

Youth groups, such as those in the Pianggo community, expressed interest in cultivating vegetables, particularly to earn income to meet their needs. Of the 21 young people in Pianggo (Dayak Ma'anyan) who were trained, 14 of them became producers and sold vegetables in the market. Similarly, in the Bangkal community (Tomuan Dayak), 10 youngsters made vegetable production as a source of income.

Campaigning for rights

To show the importance of their right to food and farming traditions, the Dayak community has participated in a campaign from their village demanding state

Box 3: Blessing the first rice after harvest

Ibu Dewi Padi, thank you for being a blessing to us again this year.

It was as if we were being fed again after six months of planting and caring.

We are grateful that even in uncertain weather conditions, we can still get a new harvest that is still good for us.

Thank you Gods and Goddesses of nature who are very friendly to take care of our plant seeds. Hopefully by enjoying this new harvest, we will have a new spirit to continue to maintain the seeds of the universe in the form of rice. Let us stay strong and work for the welfare of nature and the good of us humans in this land of ours.

Thank you Bhatara, the Goddess of rice.

recognition for the superiority of the local seeds they have. Men and women in one spirit called for the protection of their lands, forests and food seeds. As one example, the 8 Dayak Ma'anyan communities held their last meeting in November 2022 in Tangkan village, East Barito.

Results

Communities are serious in protecting land and forests, where they carry out farming. They have the courage to continue farming despite the ban on burning by certain parties from the local government. Communities are able to produce enough food through sustainable agriculture practices. Even during the Covid pandemic, food security for the family was guaranteed and no one went hungry. People are able to save crops to support their families for one year or more.

There has been a change in the mindset of the farmers. They have realized that it is they who are responsible for the sustainability of their lives and livelihoods and hence have to take action as a community. To achieve this they have shown an intense desire to learn and improve their knowledge and skills in various aspects of farming and also their rights and responsibilities. Besides, they have understood the importance of local seeds and are learning how to collect and build seed banks in each community and seed distribution mechanisms. Communities are independently carrying out routine FGDs which also serve as a platform for shared learning. This can be found

Communities together map the village and individual farms

particularly in the *Bangkal, Penyang* (Tomuan) communities as well as the very active *Tangkan, Matarah, Pianggo* and *Bentot* communities.

There is an active participation of communities in addressing their local issues. There are communities that have made amendments to village regulations. For example, in the village of Pianggo, a PERDES for the protection of land and cultivation was made. This was intended to minimize the release of land and forests to extractive industry practices. Similarly, in the village of Kubung (Dayak Tomuan) a PERDES has been made that prohibits releasing pigs in the village. The purpose of this village regulation is for residents to use their yards for horticultural crops.

JPIC, as an organization has also had a great learning experience working with communities, using the People Led Approach. It realized that sustainable food is the basic need of the communities and would like to work for protecting farmers, farming and forests in all its future endeavors too. JPIC and the network continue to have a dialogue with the local government to issue a policy to protect farmers and acknowledge local seeds belonging to the indigenous Dayak community. In its effort to help communities better, JPIC plans to continuously build the capacity of the organization through learning exchanges.

PLDP

Transformation through empowerment of tribal communities

■ Kiran Waghmare

The tribal communities in Maharashtra are moving towards self-reliance and self-sufficiency, by reviving traditional wisdom, traditional cultures and traditional farming methods. With increased awareness and learning, their confidence to fight for their rights and govern themselves has enhanced. They are now able to solve their issues, collectively.

Katkaris and Thakurs are the predominant tribal communities living in the 15 hamlets in Kalyan block in Thane, Maharashtra. 'Katkari' and 'Thakur' communities are indigenous owning traditional knowledge base and skill sets. Katkaris are designated as one of the 'most backward' communities by the Maharashtra government and are classified as a particularly vulnerable tribal group (PVTG).

These hamlets are generally small and situated far from the main villages. The communities lack access to basic needs like water, food, shelter and education. The topography is undulated and the region is plagued with issues of land, water, and forest due to industrialization and urbanization. There is a 'gavki', a local self-governance system which exists in each hamlet to resolve common

Women conserve local seeds for crop production

issues and to carry forward the village development. However, the dominance of non-tribal communities is prevalent.

Communities lack ownership on land and practise leased land farming to grow food for the family. With undulated topography, water distress is widespread which becomes acute during the summer season. Owing to water scarcity, paddy is grown during kharif season. Communities grow pulses and vegetables during the Rabi. Farmers have been practising conventional agricultural methods, using hybrid seeds and high external inputs.

Apart from farming, tribal communities also depend on the collection of minor forest produce from the forest, for their survival. During the off seasons, people engage in labour activities.

Traditional storage methods for storing local seeds

The initiative

In 2016, Karunya Trust started working with the communities in this area to help them reflect on their issues and find local solutions to address them. In the beginning, we started with a conventional activity-oriented approach which was unidirectional. We were teaching them the concepts and process as we considered ourselves as experts. But, communities were hardly participating in the process. With internal reflections within the organisation and exposure to the People Led Development (PLD) approach, we adopted an alternative development process which is more participatory, to help communities become self-reliant and self-sufficient and build their confidence to fight for their rights.

Five staff were initially engaged in the new approach. Meetings were conducted with the staff to give orientation on the PLDP approach.

PLDP process

A number of meetings were held with the people in these hamlets, discussing the approach and the need for participation by people. Initially communities were looking forward to doles and donations. Participation was quite low. Added to this, the internal politics of the villages haltered the process. Overcoming the initial disinterest, village-level meetings and home visits were conducted to create interest and awareness among the community to increase participation. Slowly people came forward and started attending meetings. Through home visits and meetings, they realised that this approach can be good for collectively resolving issues. Gradually, participation increased. People became aware of the process and came forward to take responsibility and uplift their own communities.

A series of reflection processes were conducted. Communities realised and expressed that the modern lifestyle has affected their culture and traditional practices, language, costumes, etc. During such meetings, they identified their issues and the organization performed its role as a facilitator.

Participatory mapping exercises like resource mapping were done to identify the available resources to build a community to claim the rights for community common assets.

A lot of focus was laid on building capacities of communities. Awareness meetings were organised on the importance of natural and traditional farming. Workshops and demonstrations were conducted for farmers to understand better. Workshops on land rights and forest rights were conducted by staff. For the land and forest right program, regular visits were done in the villages, and meetings were conducted regarding specific issues. Karunya Trust with the support of resource persons organised several training sessions. Exposure visits were organized. Online sessions were organized during the pandemic.

Meetings also focused on increased participation in the governance system.

People were educated on general resolutions of the government and were encouraged to raise questions in the Gram Sabha.

Communities were engaged in many learning and development processes which made a great impact on them.

Traditional farming system has come to stay

Back to traditional farming

Majority of the farmers do not own land. They lease land and cultivate. Leasing is considered as an illegal agreement between the land owner and the farmer. Through the lease agreement the farmer acquires the right to use the land for a maximum tenure of 3 years. In return, farmer shares 50 % of the cultivated produce. Around 470 farmers from 12 hamlets took leased land and started cultivating paddy.

Owing to increased awareness on natural farming methods, through the trainings and workshops, farmers were willing to return to traditional methods of farming. In making this shift, farmers wanted to revive the use of local seeds, manures, pest repellents, and markets on their own, so that the dependency on external inputs is reduced. To hasten this shift, a number of learning exchange programmes were organised.

Around 23 Learning cum Exchange programs were conducted in 10 hamlets. More than 50 women from two hamlets, shared their knowledge on traditional local pulse crop seeds and traditional storage methods to conserve and multiply them. During such exchanges, around 18 types of seeds were shared. For example, seeds of sorghum, wheat, maize, papaya, mustard etc., were shared by visitors from Nepal while the community shared 35 types of seeds which included Nagli, Varai, Bhadas, Rajgondya, Kolam-small, Kolam-medium Jhini, Bodaka, Arjun, Selava, Salava, Mhadi, Bitter gourd, etc. Following the learning exchanges, around 36 awareness programs were organised on the promotion of traditional farming systems. These were conducted in Dahivali, Nalambi, Poi, Naitharpada, Kelni, Thakurpada, Kunde, Belkarpada, Bhisol, and Bangarwadi hamlets. Around 600 farmers have started practicing traditional farming methods. Around 40 farmers from Poi shared their farming practices and knowledge on vegetable cultivation with farmers from Chavare hamlet with practical demonstration. As a result, all the women from Chavare started cultivating vegetables and got a good income of Rs.15000 per month.

"Karunya Trust has been facilitating us on sustainable agriculture for the last 6 years. Having understood the importance of natural farming and food sovereignty through learning exchange programs, exposure visits and demonstrations, people took to traditional farming practices" said Mr. Anna Hindole, an active farmer from Thakurpada hamlet.

Having realized the importance of local seeds in the food production system, communities started conserving local seeds. Seed melas were organised to enable seed exchanges. Five seed banks using traditional methods like earthen pots, were set up at Nalambi, Kunde, Thakurpada, Mhasrundi, and Dahivali hamlets.

Tribal community revived their traditional crop and used the traditional methods of farming as well as started promoting food sovereignty. Forty five people from 5 hamlets Thakurpada, Dahivali, Belkarpada, Mhasrundi, and Kunde started cultivating finger millet, a traditional crop. Two local weekly markets have been established through the people's initiative to sell their vegetables and other farming produce.

With increased engagement in farming, people have stopped migrating to the brick kiln work.

Revival of traditional foods

People took an active interest to preserve their identity/tradition by celebrating traditional festivals like tribal day, and food and vegetable festivals. Food fairs were encouraged to enable exchange of traditional ethnic food knowledge which was already present in the communities. These food fairs were organised to promote better nutrition among the communities. Five Tribal Food festivals were organized to introduce the traditional tribal food to the non-tribal community. This has resulted in diet diversity of tribal as well as non-tribal communities.

Women farmers revived the use of local seeds and traditional farming methods by sharing knowledge

Women took more interest in the forest vegetables, also for their medicinal value. Women collected the forest vegetables and displayed them in the fairs. This provided an opportunity for the younger generation to gain knowledge on different types of forest vegetables, like Takla, Kurdu, Kaila, Dinda, Gholubhaji, Katmat, Nalibhaji, Kuda, Tera, Koral, Telpat, Thaiwal, Gaboli,

Kuttupat, Chadukali, Shevli, lot and Khadak Ambadi. The importance of forest food became all the more relevant during the COVID-19 pandemic. People realized the need for forest food and people from 5 hamlets Dahivali, Kunde, Thakurpada, Belkarpada, and Mhasrundi preserved their forest-based food culture.

Fighting for rights, collectively

Communities initially lacked awareness on the importance of basic legal documents like caste certificates and ration cards. In the absence of these documents they were not able to avail the various government schemes. A number of meetings were organised to create awareness on the need to have legal documents and the benefits which they are entitled to from various government schemes. Through PLDP approach, not only was there increase in awareness, but also leaders, community mobilisers and facilitators, emerged locally. Around 859 people from Kelni, Poi, Nalmbi, Dahivali, Kunde, Bangerwadi, Anepada, and Thakurpada hamlets received their caste certificates.

Seed exchange - key to local seed conservation

Gradually, people took an active interest to attend the meetings and workshops on various topics to understand the problem-solving process. They have slowly started participating in the decision-making process and trying to bring changes in communities, despite being hindered by internal politics of the non-tribal communities from the village. They understood the 'panchayat raj' system and started visiting block and district-level offices for long-term pending issues, hitherto unheard by the gram panchayat.

They came together to write applications to claim individual forest claims. Individual forest claims refer to those who are cultivating forest land but do not have supporting documents/title deeds. According to Forest Act 2006, an individual can claim upto 4 hectares, as long as it is being cultivated for themselves for a livelihood. Around 45 applications were submitted from Kunde hamlet on Individual Forest Claim (IFC) in gram panchayat office by the Forest Rights Committee. As a result, all 45 applicants received the land for cultivation though it was not satisfactory for those who received.

People from Dahivali, Kunde, Thakurpada, Belkarpada, and Mhasrundi hamlets prepared slogans on posters for building awareness on Tribal Rights.

Communities succeeded in getting individual forest claims

The book on the 'Adivasi lifestyle' was written and published by Karunya Trust based on the information collected from the community. A copy of the book was submitted to the sub-division officer and as a result, 'Panchanama' (title of recognition) was distributed to people from the Thakur community, who did not earlier have any evidence of being residents since 1950. A traditional hunting and farming equipment museum has been established at Poi hamlet.

A lot of focus given on building and strengthening the capacities of people, resulted in emergence of local leadership. 'Adivasi Vikas Samithi' (AVS), a block level forum was established in 2016 to resolve collectively the major issues being faced by the community. Meetings were conducted in all the 15 hamlets. It was decided to extend mutual support among themselves to solve the common issues of all the 15 hamlets. Major issues related to issuance of ration cards and caste certificates, drinking water, gavthan (village commons) etc., were resolved through the forum. For example, after 3 years, the drinking water issue got resolved at Kelni, Belkarpada, and Mhaskal hamlets. Similarly, the road issue in Bangarwadi too got resolved, after 5 years. Communities have also been supervising public distribution system shops, midday meals at schools, etc.

People's mindsets changed from being individual to managing communities. They took responsibility and ownership of public resources created through collective efforts. People started collecting local contributions to solve issues collectively. Community participation has increased in local self-governance. People are aware of the three-tier system of panchayat raj. They do visit the village, block, and district-level government offices to resolve issues and claim their rights. The tribal development committee is strengthened to solve problems through new and emerging leaders from their communities.

Challenges, learnings and way forward

However, there were a number of challenges too while implementing the PLD approach. Initially, communities were not willing to participate. They were looking forward to doles and donations. Added to this, there were internal politics which affected the work. Building rapport after a long gap was itself a challenge. This was overcome by conducting extensive awareness meetings and frequent visits.

Participatory processes like PLD approach is a time consuming process. Many times, communities themselves were impatient with the delay in results. However, they understood that though time consuming, PLD is a sustainable approach.

Also, the period coincided with the Covid 19 pandemic situation. Funds from the government available under various schemes and welfare measures were diverted to tackling the pandemic. Also, government offices were functioning with a restricted number of staff, causing enormous delays in processing. Also, frequent transfers of government staff haltered the whole process.

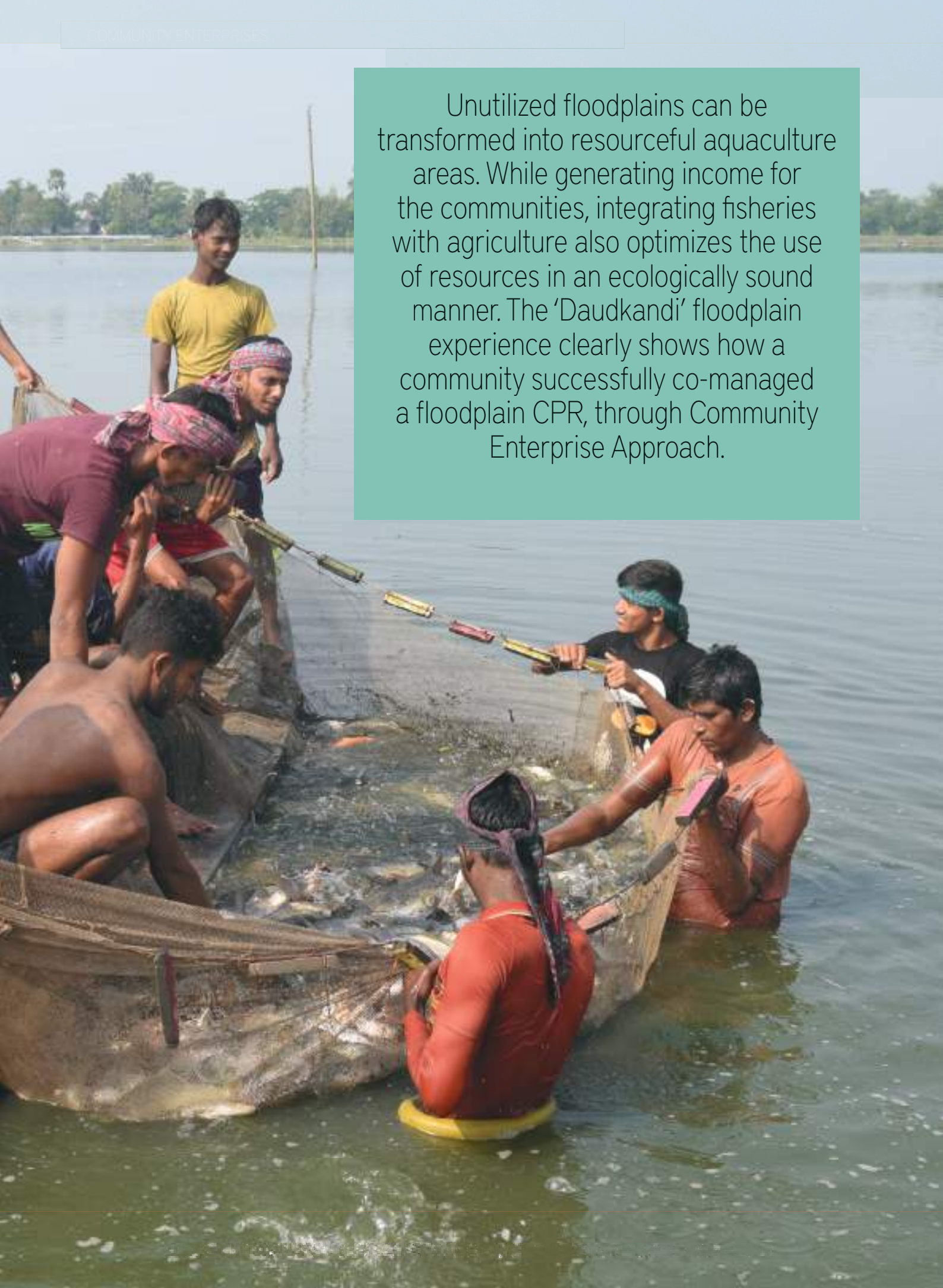
Karunya Trust had to go through a challenging time as the staff were new to PLD approach. Without professional training on the implementation of the PLD approach, the staff reoriented to the approach through experience. They also gained better understanding while explaining concepts to the community. They realised that communities have the wisdom and knowledge of their tradition, culture, customs, and practices, and that an NGO's role is that of a facilitator only. Thus, they shifted from project implementation mode to empowering problem solving mode.

PLD approach will be expanded to new areas reaching out to a maximum number of disadvantaged communities within the district. This alternative approach is planned in such a way, that it will complement the need–based interventions. Political education will be focused to a large extent on developing politically active groups advocating for their rights at the state and national levels. In future, the organisation plans to follow PLD approach which goes beyond promoting sustainable agriculture, thus making this process truly people led.

Community Enterprises

key to development and empowerment of communities in floodplains

■ Sakiul Millat Morshed



Unutilized floodplains can be transformed into resourceful aquaculture areas. While generating income for the communities, integrating fisheries with agriculture also optimizes the use of resources in an ecologically sound manner. The 'Daudkandi' floodplain experience clearly shows how a community successfully co-managed a floodplain CPR, through Community Enterprise Approach.

Being a delta, each year large portions of cultivable land in Bangladesh are inundated during the monsoon season. In a normal year, around 20 percent of the country may be flooded during the monsoon, and in some years, flooding can affect more than 60 percent of the country, making floodplains one of the major CPRs of Bangladesh. Around 2.8 million ha of water bodies are formed every year by the inundation of floodplains. The land is either left fallow or used for the production of low-profitability deep water rice, during periods of inundation.

Familiarity with aquaculture practices is widespread in Bangladesh with many households farming fish in their own ponds adjacent to their homes. Much of the aquaculture activity in Bangladesh takes place in perennially inundated water bodies. Seasonally inundated fields, also called as flood plains, offer great opportunities for the poor, to take up fish culture. However, open access to these resources and their indiscriminate use have led to over-exploitation and reduced productivity, making the system very unreliable in its ability to generate benefits for the people.

Need for community enterprise

Seasonally inundated floodplains remain a seriously under-utilised and potentially highly profitable resource in Bangladesh. Most of these floodplains are composed of private lands, which are mainly used for agricultural purposes during dry seasons. A floodplain usually becomes a single water body, connecting lands which are owned by different owners, and sometimes under different property rights regimes. Thus, they become unusable for

The genesis of the Community Enterprise Approach on Floodplain aquaculture

1994-96	Enterprise approach for community based floodplain fisheries project Pankowri Fisheries Ltd. initiated : SHISUK played the catalyst role
1997-2000	Replication started in neighboring communities as a trickle down effect
2004-2005	Consolidation of learning and 6 new projects facilitated by SHISUK with necessary rectification
2006- 2012	Scale up initiative by Govt. (DoF), SHISUK and self-replication. But not much replicated besides Daudkandi
2013	Transformation to second generation of management (contract farming by the community entrepreneurs) in Daudkandi.
2013- 2020	Piloting and scale up of the model in Chalan beel area (Northern Bangladesh) and Tidal floodplain with support of KGF (Krishi Gobeshona Foundation)
2019	BARD and SHISUK joint Initiative for Community Enterprise Approach with Public Private and People Partnership (4P)

investment-based resource development or extraction, unless some collective arrangement is made among rights holders.

As the number of seasonal floodplains is increasing owing to climate change and increased flooding, especially in low lying countries such as Bangladesh, it is becoming increasingly important to utilise and manage these flood plains so that existing livelihoods are not disrupted. Adoption of aquaculture in flood plains requires agreement of all landowners. Informal contracts are often easier to enforce between people who are socially similar to each other. However, when multiple social groups interact, a formal contract across multiple actors becomes necessary, for ensuring participation of all. Earlier, a few initiatives were tried but failed due to lack of agreements among landowners, conflicts over sharing costs and benefits, alternative seasonal uses of floodplain lands, etc. Also, any initiative like the Floodplain Aquaculture enterprise initiative would require considerable investment in infrastructure because of the water-body's nature, in addition to fish culture related investments.

Community Enterprise Approach (CEA) intervention can be an adaptation model to make use of the changing condition which improves productivity, holds out a bright promise of accelerating Gainsharing for Growth Together. In 1996, shortly after the construction of the Gumti embankment, a local NGO called SHISUK began promoting a community management approach to floodplain aquaculture and worked with local communities to develop successful floodplain aquaculture practices.

Community Enterprise Approach

The 'Community Enterprise Approach' (CEA) mobilizes the community and creates 'enterprises' or collective business entities to manage and utilize the community assets and resources like untapped floodplains. This approach combines the power of corporate incentives for efficient management of the resource, with the democratic mandate from the community to involve all community members in the economic development process. After mobilizing the community and the landowners, the community enterprise offers 'shares' to the community, by which community members become shareholders (owners) and are empowered to democratically elect their representatives, who make management decisions. So, the enterprise works like a publicly traded company, although the shares cannot be traded.

Community enterprise is a People Led Development mandated beyond economic activities and includes other development goals. Community enterprise particularly in the rural areas means about how people come together, work together with their land, water or common properties, how they can improve their production and productivity, how they will be ready to take risk, how they can manage the risk and how they can reduce the chances of loss. And, it also includes how they can fix their goals, mobilize resources, use the latest technology, acquire appropriate knowledge and skills to achieve their goals that make them into an enterprise.

It is an enterprise of the community, by the community and for the community. The enterprises are owned by the local community itself, which not only generates income and jobs for the community, but the participation of community members in decision-making, management and implementation of the projects turn the community members into entrepreneurs. This approach is also distinct because it emphasizes the involvement of larger community,

not specific segments of the local community. The enterprise structure also ensures that the community enterprise entities become self-sustainable within a short period of time. In this approach, part of the enterprise profit is also invested back in the community for social development.

The role of an NGO is limited to providing a platform for dialogue, enable strengthening local level governance and facilitating more interaction and participation of all stakeholders.

The Initiative

SHISUK has been working in Bangladesh since 1996 to demonstrate Community Enterprise Approach (CEA) for community development that centers on untapped community resources. Generally, development initiatives in Bangladesh target various groups considered to be especially vulnerable, such as the extreme poor. This community led collective initiative ensures that the whole community is involved, as targeting certain groups breeds social conflict that can have serious unintended detrimental effects on development efforts.

Strong people's voices and their organisations are critical for social change and democracy. These include organisations of small farmers, rural women, indigenous peoples', agricultural workers and small food producer's that assert rights including children's and women's rights, right to a safe and healthy environment, right to health and well-being, not use or be exposed to hazardous substances including agrochemicals, and to sustainable livelihoods. The CEA was conceptualized to demonstrate People Led Development approach to achieve the following objectives:

1. Creating partnerships with communities to facilitate participatory management of existing resources (land, water, capital, human, wisdom and CPR) for sustainable community development.
2. Strengthening the capacity of farmers, women, youth and agricultural workers to reduce the harm caused by highly hazardous pesticides and chemicals by promoting agroecology and green development approach.

Fig 1: Development and operational cycle of Community Enterprise Approach on floodplain aquaculture

SHISUK's Community Enterprise Approach (CEA), popularly known as "Daudkandi model" is a People Led Development (PLD) approach. It mobilizes greater community to take collective enterprise initiative for increased productivity (fisheries and agriculture) based on untapped and emerging floodplains. To turn these un/underutilized floodplains into profitable aquaculture-agriculture project, CEA helped to align individual interests with community interest by making a win-win negotiation. Also, empowers all community members to democratically participate in decision making. Using this approach, very large inundated fields have been used to produce fish during the monsoon season, but then are returned to agricultural production during the dry season.

The process

For initiating a successful management system for a floodplain, the first issue to resolve is the seasonality and the unique tenure system of floodplains. SHISUK organized meetings of community members to mediate, debate and discuss questions or concerns of stakeholders. They are concerned generally about the risks of investing, potential damage to property, and access rights.

The land inundated by the flood water was leased in. The landowners agreed to this contract in exchange with payments. An embankment was built, covering only part of the floodplains which are the land areas of the landowners who agreed to the contract. This enclosed area came under the community enterprise during monsoon. During the dry season, the landowners regained their right over individually held lands. Through the leasing system and having a cap on individual shareholding, the bargaining power of the landowners decreased and reduced the transaction costs. Share issuances also raised sufficient capital that could be invested for building specialized physical capital, such as the embankment. The risk for each shareholder was lower, as most people in the community were part of the shareholder group. Moreover, the CE approach promised greater profits for people who took more risks. Hence, it managed the risk preference of the community members effectively, including that of the landowners.

Marginal farmers and landless benefitted by increased employment opportunities

To initiate a community enterprise, the entire community is mobilized using the 'asset based community development' framework. Identifying the

Entire community is involved from producing to marketing fish

community assets and networks, relationships are built with the community leaders, collected stories of community success from community members and involved key community stakeholders in the planning process. Most importantly, community networks are treated as assets. They not only result in building trust with the community, but importantly, build social capital among the community members. The increased social capital significantly lowers the transaction costs.

Capacity building exercises were conducted for the community users, given that there was no specialized fisher group in the community prior to this initiative. The training was offered free. Most of the beneficiaries were the landless and marginalized people. They gained a specialized skill and were employed by the enterprise for floodplain aquaculture. Local leaders and landowners lacked experience in commercial aquaculture, hence, several workshops on the system dynamics of floodplain aquaculture were arranged. Through these initiatives, the capacity and knowledge gaps were addressed.

In the demonstration projects, SHISUK, the facilitating organization, also provided management support in various ways such as arranging external credit when required, performing audits, supporting staffing, establishing networks with government bodies. These are crucial activities, especially given that a formal enterprise was established, with community having no prior experience in dealing with these issues.

Towards agroecology and green development

A number of activities were taken up to practice farming to produce safe food and not pollute the environment. Awareness programmes about the ill-effects of climate change on agriculture were carried out. Farmers were prepared and guided for changes in cropping patterns to be adopted. Natural resource conservation activities like afforestation, water harvesting and conservation, conservation of bio-diversity were taken up. Good crop management practices were promoted to reduce green house gas emissions. For example, when seedlings are ready to be planted, the water is drained and seedlings are planted using soil moisture. This saves drawing of ground water for irrigation at the beginning of the season. Normally, in the floodplains, farmers used to spend a good amount on clearing weeds like water-hyacinth, using weedicides. But, CEA-based aquaculture prevents weedicide use and floodplains remain clean. Because of cleanliness, there are fewer pest manifestations and pest breeding, thus reducing pesticide use. Also, the supplementary feed for fish and fish droppings contributes to soil fertility. This reduces the use of chemical fertilizers and the costs.

Risk mitigation tools, e.g., crop insurance, alternative options for livelihoods, were promoted. A hub for networking was created with already established national and international systems to disseminate information to grassroots in advance about the incoming disasters.

Results and Impact

A study conducted in Comilla district in rural, southeastern Bangladesh covering 15,594 households in 62 villages and 405 water bodies, reported interesting results. This area was an early adopter of large-scale, seasonal floodplain aquaculture. Majority of households reported economic engagement with inundated fields. The evidence of increased income owing to aquaculture is around 28,000 Taka (400 USD). Substantial increases in household monthly expenditure and savings were found.

Increased productivity of fish and improved income has resulted in better food and nutrition security. Protein intake has considerably improved.

The approach has helped the underprivileged to join the mainstream and reap various benefits. Through single voting rights for every member, the underprivileged got an opportunity to participate in the mainstream collective decision-making process. Marginal farmers, landless and fishermen are the most benefitted owing to the CEA, by way of better employment and entrepreneurial opportunity. Around 24 new category jobs and livelihoods (backward and forward linkage) have emerged from floodplain aquaculture during lean season. Around 144 person-days/hectare of non-recurring employment and 72 person-days/ hectare of recurring employment was generated.

The approach has not only been highly profitable, but has had significant impacts in terms of social well being. The social conflicts have significantly reduced. They have also seen a shift from mass out-migration to in-migration, a demonstrable sign of the improved well-being of community members as a result of pursuing community enterprises based on their common interests. A part of the enterprise profit is also invested back in the community for social development, and the underprivileged are the key beneficiaries of such development.

Large inundated fields are used for fish production during the monsoons

Women have equally benefitted from increased income and food security. SHISUK has facilitated women's organizations of 700 members to support their self-help or collective enterprise initiative that builds their leadership and financial literacy towards strengthening women's empowerment. The organization has collective capital of over 2.5 million BDT (Bangladeshi taka) equivalent to USD 25000, as a result of collective savings and income.

Women are very much involved in many backward and forward linkages like fingerling rearing in their ponds, making bamboo baskets, drying fish, etc. Gradually, more women are contesting in elections for the position of Board of Directors. The community enterprise welfare fund is contributing to setting up public toilet facilities as per the demand by women.

The CEA approach has resulted in a number of impacts related to climate change as well, in terms of reduced green house gas emissions; enhanced biodiversity; better ground water recharge etc. Good crop management practices were promoted to reduce green house gas emissions.

It is evident that there is a trend of improvement in the groundwater table in Daudkandi. The floodwaters typically arrive in May/June and last until October, with the majority of the water draining into the sea. But the floodplain aquaculture holds the water till the end of December for the Rabi cropping season, which allows 2-3 more months to recharge the groundwater table. The time gained for recharge as well as less need for drawing underground water for irrigation due to better flood water management, has resulted in better groundwater recharge.

Conventionally, the open floodplains are dried up and poisoned to exploit the last harvest of the fisheries, which destroys the breeding grounds of the wild fish. CEA aquaculture maintains at least 10% of the floodplain as sanctuaries for the wild breed of fishes and to stock small fishes for the next season. Besides, controlling harmful pesticide use, less use of chemical fertilizer helps to protect and improve the biodiversity in the floodplain.

The stakeholders ability to cope with natural disasters such as storms, floods and droughts has improved. They have learnt to adapt to ongoing climate change. Communities have become resilient in facing adversities, both at the household and at community level, owing to the improved economic conditions.

CEA has created a platform of better interaction and governance for growing together, involving the entire community, with the equitable partnership. The average number of stakeholders has increased from 12 in the pre-project phase to 40 in the post-project phase.

Recognition and Scaling up

After the inception of the Community Enterprise Approach (CEA) in 1997, it has replicated in the neighboring communities as a trickledown effect without any external support. The initiatives are sustained till today, constantly improvising for better results. The farmers involved in the pilot project also had their lands in the neighboring floodplains, thus becoming the catalysts for the new initiatives. There are about 100 CEA initiatives in Daudkandi sub-district producing more than 20,000 metric tons of fish annually in the floodplain during monsoon alone, which remained unproductive. The productivity of fish has increased more than 4 metric tons/hectare. On the other hand,

due to aquaculture, multiple benefits have accrued. These include, market transformation, strengthening of social cohesion, improved local governance, collective decision making ability to build a resilient community, increased nutrition intake, improved gender relations and women empowerment and sustainable community development. The model has been recognized as SAARC Best Practice and is included in 7th and 8th National Five Years Plan as a strategy to increase productivity in aquaculture.

Conclusion and way forward

Unutilized floodplains can be transformed into resourceful aquaculture areas generating income for the communities. Integrating fisheries with agriculture also optimizes the use of resources in an ecologically sound manner. Moreover, the process of community mobilization to manage the resource creates more social capital in the community and drives bottom up the economic development process. Aquaculture can also provide the poor, access to nutritious fish at low cost. It facilitates social development by mandating part of the profit to be invested back in the community. The 'Daudkandi' floodplain experience clearly shows how a community successfully co-managed a floodplain CPR by partnering with a local NGO, through Community Enterprise Approach.

The model/ innovation initiated long ago has got due recognition. In the pilot project areas, the fisheries production did increase many fold. It has potential for scaling up further. However for wider upscaling, a series of strategies have to be taken up in three areas, namely, (a) Institutionalization of Community Enterprise Approach (b) Vertical development of the model- by strengthening the market linkage and value addition of the ongoing community enterprises and (c) Wider community outreach.

Increased food production has resulted in enhanced nutrition and income

PLDP

Revival of traditional farming

through PLD approach

■ Fr. Alphonce Toppo

Local people organisations were formed to facilitate collective actions

People Led Development approach has transformed communities in the tribal regions in Orissa, to become active participants in the development process. The journey has been equally enriching for the organisation as well, leading to development that is sustainable.

Xavier Xalxo of Birsingarh village is a progressive farmer. He possesses 9 acres of land. He cultivates paddy, millets, vegetables, grams, beans, lentils etc., both for consumption and the market. He had been cultivating high yielding seeds and was applying chemical fertilizers and pesticides. In spite of attending discussions on traditional farming many times, he had no faith and interest in traditional farming. One day, he happened to visit a trial farm of Damian Soreng of Dantri who cultivated paddy by using compost and other bio fertilizers in one plot. He also maintained a check plot of paddy which he grew using chemical fertilizers and pesticides. Xavier Xalxo observed that paddy grown with compost and organic manure was healthy, and grains had weight, unlike the one in the check plot. This inspired him. There was gradual change in his perception towards traditional farming. He cultivated paddy using traditional farming practices in the following year. There was no disease or pest attack this year. He harvested 43 qtls, about 5 quintals less than last year, inspite of untimely rainfall. However, his net income was more by Rs.1450, as the production cost had drastically reduced. Xavier Xalxo is now completely convinced with the traditional farming methods.

Xavier Xalxo is one of the many farmers in the tribal regions of Sambalpur district, returning to traditional agriculture. Thanks to the efforts of Sambalpur Social Service Society (SSSS) for reviving traditional farming in order to promote food sovereignty among the poor tribal farming households.

Background

Around 70-80% of the population in the Western Odisha region depends primarily on agriculture, for livelihoods. Majority of the farming households belong to small and marginal farmers' category. Besides, tribals of the region are subject to enduring structural dominance and control. They experience deprivation and distress.

Almost all farmers have switched to a high external input-based system of farming, encouraged and supported by the Government. In the race towards higher yields and incomes, especially from water intensive crop like paddy, farmers had to face a number of challenges, which is a consequence of the high input agricultural system. Farmers lost their traditional seeds and crop diversity. They have become market dependent for food items; farmers who were producers have become consumers and have lost food sovereignty. Due to over market dependence for seed, fertilizer and pesticides, the cost of production has increased, making farming unremunerative. With over use of chemical fertilizers and reducing livestock numbers, the fertility of land has deteriorated. Erratic rainfall has forced the farmers to leave cultivating millets.

To address these issues, in November 2019, SSSS through *"ASHAKIRAN: a ray of Hope for marginal farming com*munities" project started working for the revival of traditional farming towards food sovereignty among farming households with following specific objectives.

1. To enhance traditional food production of small and marginal farming households
2. To strengthen target households to access government schemes on agriculture
3. Strengthening local people's organizations to adopt People Led Development process.

SSSS started working in 40 remote tribal villages of Bamra, Naktideol, Jamankira and Jujumura blocks of Sambalpur district, Kirmira block of Jharsuguda district, Tileibani block of Deogarh district and Ulunda & Birmaharajpur blocks of Sonepur district in Odisha to initiate participatory approach towards development of indigenous people.

The PLD approach- The beginnings

Development is important for every society. Different approaches to development have different levels of impacts. An initiative was taken up by SSSS to discuss the concept of development among the community. An understanding evolved through participatory discussions that the development is by an outside agent. State is implementing welfare measures to alleviate poverty, improve health situation, improving infrastructure, improving quality education and life etc. Corporates, NGOs and other stakeholders are implementing various programs designed systematically by experts. All these developmental agencies in a way impose their concept of development on the people. They said, "we as 'hitadhikari' (beneficiaries) are turned to 'Bhikari' (beggars) in the process. No one asks what we want. None involve people in designing their development process".

People Led Development (PLD) process aims at putting people at the center. It's a democratic process where people take collective decisions to bring about change and growth in their life situation. It's a participatory process and the external agent only facilitates the process.

Prior to this, SSSS since 1979, has been intervening on thematic issues with appropriate approaches. Later the organisation moved from charity based to issue based to right based approach and finally adopted the PLD, the community driven approach. Even before the process was followed with the communities, it was important for the organization to gain more understanding on the approach.

In 2015, Odisha Partners of PLD India programme included SSSS as an upscaling partner of People Led Development process. Since then, coordinators Mr. Sidheswar Kandian, Ms Bharati Dash, Miss Kalyani Patnaik together with the Director, Fr. John participated in various participatory programs, workshops, exposures, area level events, implementing pilot interventions. They familiarized themselves with the concept of PLD process. Initially, the staff weren't convinced of PLDP and were not willing to learn, unlearn and relearn. But with several orientations and participation in participatory processes with the communities, the staff got convinced about PLDP.

With the help of Odisha partner, SSSS conducted Action-Reflection-Action session with '*Khadia*' tribe at Amlikhaman village in 2019. As the initiative progressed and the process got clarified, staff were convinced and grew confident of the PLD approach.

The People Led Development approach has been strengthened through PAR exercises, facilitating collective actions and establishing community organizations to achieve the objectives of the initiative. This concept was discussed in the community and whichever community expressed its willingness to participate in this process was included in the process.

Community organization

Organising communities was crucial as the goal was to empower people to lead the development process. Local Peoples Organisation (LPO) was formed in all the 40 villages. They were oriented on their role, responsibilities and functions. LPOs were supported and strengthened by the Project staff in the first 6 months. Then they gradually facilitated them to lead their respective communities to address their issues.

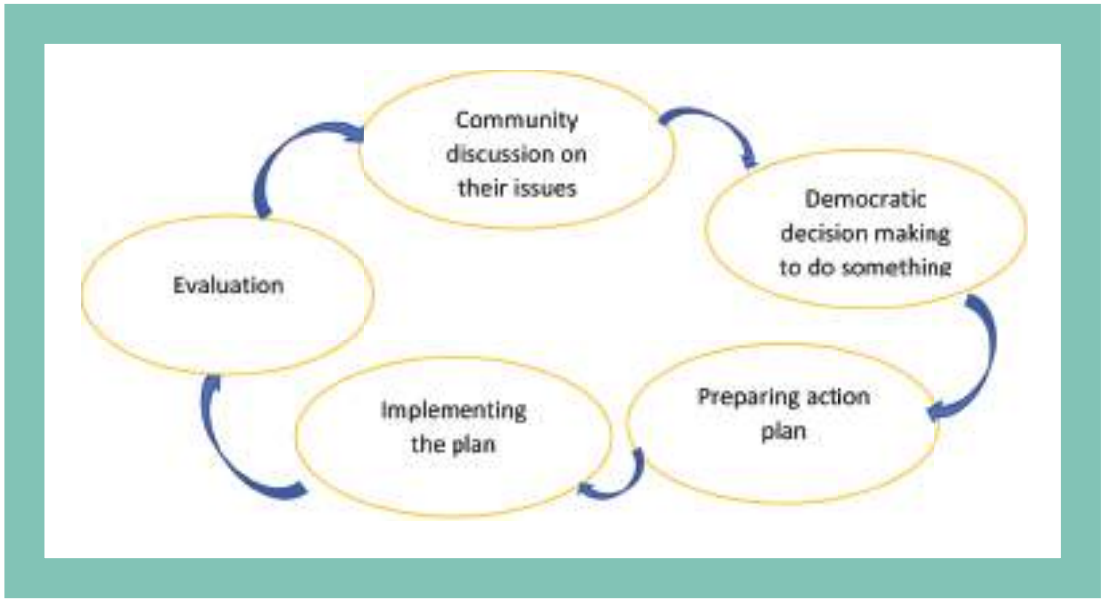
The LPOs followed specific tool called Action-Reflection-Action process (Figure 1). The activities in each stage of this cycle were undertaken by the community itself. The role of the LPO is to facilitate the community to accomplish activities in every stage. The staff of SSSS only support LPOs and will not carry out any activity in the community without the knowledge of LPO.

Executive committee of LPOs conduct regular meetings to assess the progress. LPOs establish linkage with government officials to discuss their issues with line departments and get support through various government schemes.

Awareness and capacity building

Initially, to understand the ground reality, communities were facilitated to go on a transect walk through the village. They viewed the village as an outsider and analyzed their situation from the perspective of food sovereignty and traditional farming practices. This exercise was felt very necessary, as communities had to take lead, for which they had to first understand the reality with a right perspective. Farmers realized that they haven't preserved their food culture. They have lost their traditional farming practices which were diverse and seasonal. Their diverse food basket which included millets (small millets, kodo), cereals (paddy, maize), pulses (black gram, horse gram) and oil seeds (til, ground nut, Jatangi), no longer existed. Only a few villages had preserved some varieties. Community discussed and pointed out various reasons for this loss. They include, shifting to mono-crop culture (only rice); degradation of soil health; climate change; free government ration supply; unavailability of local seed; lack of organic manure; loss of interest in farming among the present generation; people's negative attitude towards tribal foods.

Figure 1 : Action-Reflection-Action process



Communities were encouraged to recall the folklores that existed in the community, regarding traditional farming and food system. Mr. Isidore from Tendakudar recalled a song…

> *"uppar khoer madua, niche khoer gundoli, hainre, majhe khoer bunalain jinhor.*
>
> (the upper hamlet cultivated ragi and lower hamlet small millet, dear people, middle hamlet cultivated corn).
>
> *Maduaker dubu khati, gundoliker handi piti, hainre, Jinhoraker lawa bhuinj khati."*
>
> (We ate porridge from ragi, drank from small millet, dear people, we ate popcorn from corn.)

The community was made aware of the impact of modern and chemical farming on our health and the health of the soil. They were made aware of the nutritional values of the traditional foods, particularly, millets, cereals, vegetables and forest food. Training events on nutritious foods were conducted in each village. A comparative study was presented to the community of the local and traditional foods and the modern market-based foods. Looking at the various aspects of chemical farming and the inherent value of their food system, the communities decided to revive traditional farming.

Awareness on loss of local seeds and biodiversity was facilitated through *seed and bio diversity mapping*. The mapping exercise was done in all the 40 villages, in which more than 1200 farmers, both male and female, participated. The participants listed out and prepared chart of all the local seeds available in their village. They realized that though many of them have gradually disappeared, there are still many local seeds available with them. They realized that with the adoption of high yielding seeds, the local seeds disappeared gradually and there is no food diversity from their own production. They observed that not only local seed and crop diversity was getting lost but also bio-diversity was getting lost. They recalled that they used to get plenty of leafy vegetables, roots, fruits, flowers and meat from jungles; get plenty of crab,

Trial farms were set up to multiply local seeds

Box 1

Shri. Mitrabhanu Nayak of Mundakata village is an inspiration for farmers in his area. "I and my family live on farming. Two years back I was using chemical fertilizer and pesticides in my field. SSSS took me to Malkangiri for an exposure. There I learnt how to make pest repellant. I found that it was very easy to make and also without any cost. I came back, prepared the botanical pesticide and applied it in my field that year. The pesticide was very effective and no pest attacked my field. I also leant from *Asha Kiran project* to make organic manure from cow urine and cow dung. Ever since, I have stopped using chemical fertilizers and pesticides on my crops and vegetables."

"I also conduct trainings for the farmers around. I prepare the pest repellant and sell it in the market. Lots of farmers have found it effective and place order during the farming season. People around know me as organic farmer and buy my rice and other vegetables with higher price. I don't have to take my produce to the market. People come to my house and take. *Asha Kiran* has changed my life", says Shri. Mitrabhanu Nayak.

fish and shellfish from the farm fields; earth worms in the farm field made their land fertile; and insects and butterflies helped in cross pollination. But now none of these are found anymore. The communities realized that adoption of modern farming practices with use of chemicals is the major cause for the loss of local seed and bio-diversity. They were convinced that to revive crop diversity and food variety, they must revive traditional crops.

Traditional seed and food fairs

Traditional seed and food fairs were organized at Kesaibahal. The objective of the fair is to revive local food culture, food variety and promote indigenous food system. Farmers from all the 10 centers namely Amlikhaman, Majhapara, Bagdehi, Gudrapara, Badibahal, Deogarh, Bodmal, Meghpal, Dantri and Sonepur participated in the program. The farmers brought with them the traditional seeds they had and various foods they ate and displayed them. More than 500 people attended the program. By inviting the local Member of Legislative Assembly (MLA) Mr. Kishor Naik as the Chief Guest and Mr. Saroj Mahanty Convener of Desi Bihan Surakhya Mancha as the Chief Speaker, the events ensured participation of local political leaders and raising awareness on the issue.

Farmers displayed traditional paddy seed, tuber crops, oilseeds, traditional food as well as raw food and contemporary food prepared by them in their houses. Farmers also exhibited 'pest repellents' like Dumbo, Nimastra, Agneyastra, Brahmastra etc., prepared by their indigenous knowledge and resources. Three farmers Patra Bagh of Majhapara center, Buas Gudia of Sonepur and Simon Soreng of Badibahal center shared their experience on traditional/organic farming. Ten best farmers, one each from every center, were honored and were presented with a fruit plant for cultivating through traditional/organic methods, in 2021-2022 season.

Farmers exhibited the available traditional seeds and exchanged these seeds with the visiting farmers, so that those willing to revive millets and other traditional rice varieties could begin cultivating. Over 350 households cultivated at least 3 local rice varieties like Machakonta, Kalajeera, Paragudi, Sunakhadika in the 2021-22 farming season. Farmers have realized that the traditional rice varieties like Sunakhandika, Machakanta, Jamuna, Khandagiri, Agnisal are resilient and less prone to disease and pest attack. Farmers are also increasingly cultivating millets like small millet, finger millets, gangu, corn, and cereals like black gram, biri, jhudango etc.

Revival of indigenous knowledge on farming

Several meetings were conducted to discuss on indigenous technical knowledge on disease and pest control, with more than 1400 farmers. Farmers rediscovered the lost practices of locally available pest repellents. Also, community trainers (Krusi Bapa and Krusi Maa) were identified from each community and trained on indigenous technical knowledge on pest management, organic farming, quality seed production and post-harvest storage practices. They are conducting orientation to farmers on organic farming and demonstrating the production of organic manure and pest repellents.

The farmers also learnt that organic pest repellents can be prepared by using leaves and cow urine which are easily available and can be prepared at home. So, the community decided to learn and apply them in their field. They were oriented on pest repellents - Nimastra, Dombo, Agneyastra and Brahmastra. They found them very effective and free of cost. 520 households prepared and applied organic pest repellents. Farmers produced and applied pest repellents Dombo, Agneyastra and Brahmastra. Farmers used these manure and pest repellents in trial farms and in paddy and vegetables. They verified these pest repellents to be effective to control pests in paddy and vegetables. Mothers group from Danardanpali village prepared Agneyastra and Brahmastra pest-repellents and sold them in the market, earning revenue for their group. Farmers thus reduced the application of chemical pesticides.

Box 2

Sunita Kiro from Kaibeng is a 'Krusi Mitra' at Panchayat level, facilitating kitchen gardens and promoting government supply of seeds and fertilizer. One day, she participated in the *Asha Kiran*'s discussion on traditional farming. She says, "I was influenced by the discussion. During my interaction with people in the villages, I found a handful of black rice (Kalabati). I cultivated it in a corner of my field. It yielded well and got almost 2kgs. I preserved that and during the following year I cultivated entire seed in a field. It came up well and I am happy about it. I also cultivated '*machakanta*' and '*Agnisal*' varieties in the same field. All the 3 varieties have come up well."

Farmers prepare organic manures and pest repellents

Women involved in mapping seeds and biodiversity

Elderly farmers recalled that to control pests, they used to put Korla and Tendu branches in the paddy field; ash to control thrips and aphids; neem and karanja oilcake in the field to control disease and set fire in the evening around their paddy field to kill pests and insects. Some paddy growing farmers, having realized the importance and value of indigenous practices for pest and disease control, started putting Korla or Tendu branches in the paddy field. They have observed less pest and disease attacks in the paddy where these branches were put. Some farmers stated that they did not apply pest repellent or pesticide at all in the paddy field.

More than 1700 farmers were oriented on the production of manures; DAP, Herukhata, Edakhata, Khadadakhata and Jeebamruta, by demonstration. Sajagobara is traditionally used as manure and pest repellents. But it is found that only few farmers are using it at present. Other manures such as Herukhata, Edakhata and Khadadakhata are not used traditionally by the farmers. These manures can be prepared by them easily as raw materials are available in their home or villages. They can produce quality organic manure and pest repellents with minimal cost. A booklet named "Krushi Khetrare Jaibika Sara ra Proyog"(Use of organic manure in Agri-activities) is developed, to share widely, the knowledge of preparation of organic manure and pest repellent.

Quality seed production

While local seed availability was less, it was important to multiply the local seeds for wider adoption. In a series of meetings, around 1400 farmers were oriented on how to produce quality seed. Discussions were held on various aspects like land selection, seed selection, seed treatment, nutrient management,

and pest and disease management to produce quality seed. Activities like seed treatment before broadcasting, applying sufficient compost and organic manure like Edakhata, Herukhata as basal dose, applying Jeebamruta at 20 days interval, application of pest repellents like Agneyastra or Brahmastra at 20 days interval, weeding etc., were reiterated during discussions, to produce healthy local seeds. Also, post-harvest storage practices- threshing, drying, cleaning and storage were discussed with them.

Promotion of trial/demo farms

Demo/trial farms were created with traditional rice variety. More than 1100 farmers participated in the various orientation sessions conducted on trial farms and a few farmers were motivated to create trial farms. They avoided chemical application. Instead applied organic manures like Edakhata, Herukhata, Khadada Khata and Sajagobara to verify their effectiveness. They also prepared and applied pest repellents like Agneyastra and Brahmastra to testify their effectiveness.

In 2022 Kharif season, 128 farmers have cultivated 20 traditional varieties of rice in 58.41 acres of land and expecting production of approximately 1458 quintals.

Going beyond farming: Accessing government scheme benefits

Around 20 meetings were conducted, building awareness on government schemes, especially schemes under ITDA, Agriculture and Horticulture departments. The field staff from line departments oriented the communities. The community organizers offered hand holding support in filling up the forms, correcting documents, providing information and building linkages. Consequently, they were able to access many government schemes. For example, 201 households accessed agriculture related support for vegetable seeds, pumps, land development etc., 203 households accessed support from ITDA on vegetable farming, irrigation facility, seed, tent house etc., 130 households accessed Horticulture scheme, 619 households accessed support for nutrition garden, 54 households accessed support under land development scheme. Through their effort, they were able to get roads in 3 villages, anganwadi building in 2 villages, lift irrigation point in one village and a bridge in another.

Box 3: Some outcomes

- 281 households cultivated local paddy in 2020-2021
- 51 households cultivated finger millets in 2020-2021
- 368 households cultivated at least 3 local crops in 2020-2021
- 671 households cultivated at least 1 traditional crop.
- 385 households produced and applied organic manure
- 520 households prepared and applied organic pest repellents.
- 11 community trainers promoted organic farming practices in their respective villages

Patra Bag of Simliguda, Marcus Soreng and Benedict of Jhantinimal, Mitrabhanu Nayak of Mundakata, Isidore from Tendakudar, Buaz Gudia of Thengo, Simon Soreng of Kaibeng, Dahamunda village and many more have totally shifted to traditional and organic farming. They are the catalysts of traditional and organic farming.

Box 4

Mr. Digambar Bhoi aged 65 of Danardanpali (Sulia) feels that he being the President of Local Peoples Organisation he is empowered to lead the community. He says, "We were frightened to go to any office for any work. Nobody bothered about us. *Asha Kiran* formed LPO taking a few of us from village and taught us how to asses our problems and issues. Bharati Didi and animator taught us that development is in our hands. We laughed. They taught us PAR praxis. We met every month and discussed our problems. First, we thought of taking up the issue of bridge which was most important for us. For more than 6 months in a year, we were cut off, owing to lack of bridge. We approached BDO, MLA and Collector and appealed to them. Within a year, decision was taken to build the bridge. We went several times to the office even in rainy season. With our effort and government support, today we have the bridge. MLA and government officials came to this village to inaugurate it. Earlier, we had never seen government officials in our village.

Now when I go to office, they offer me seat and listen to me. They say, "*Asha Kiran ro loka asichonti, tanku ago chair diyo*" (*Asha Kiran* people have come, offer them chair first). I feel proud and accepted. I realize the power of people. We will continue this process even if Didi is not there. Now seeing our progress, other people are inviting us to their village and asking our help."

Conclusion and way forward

There is an increasing interest in traditional farming especially in cultivating millets. Farmers have understood the value of traditional food and are preparing food out of millets, roots, uncultivated food and thereby reducing purchase of food from market. Most importantly, the local organisations are strengthened and have succeeded in accessing many benefits from government schemes. They are now able to approach the government departments and resolve their issues. In short, adopting the People Led Development approach has resulted in transforming communities from being a passive receiver to an active participant in the development process.

For the organization, it has been a great learning experience. Reflecting together with the community, learning from their inherent knowledge and wisdom not only helped in understanding their issues from their perspective, but also helped the organization to facilitate actions based on community's needs. The organization learnt that the communities were more knowledgeable and there is a need to learn from them. They understood that learning exchanges are more powerful than mere trainings in facilitating sustainable development. By following PLD approach, the journey has been satisfactory in empowering communities in addressing their own issues, thereby leading to development which is sustainable. SSSS in principle will follow this approach in all its developmental activities.

Preparing local pesticide using indigenous knowledge

PLDP

Revival of *Baumo* through community led action

■ Nurbaya Zulhakim

Communities in Jambi were able to address their issues through systematic and collective efforts. The people centered process helped in raising awareness, enabled them to organize themselves, protest indiscriminate land conversion, revive traditional agriculture based on local wisdom, cultivate and access local food crops. This illustrates the strength of people led processes.

Jambi is one of the provinces of Indonesia located in the east coast, central part of Sumatera island. Traditionally, agriculture in Jambi was characterized by food crops and natural rubber plantation.

Baumo is the traditional agriculture system practiced in the region which offered food choices, access to nutritious local alternatives, as well as careful and judicious use of natural resources. The *Baumo* traditional values contain local wisdom values, environmental conservation values and spiritual values that are very relevant in today's modern life. The *Baumo* tradition is also based on empirical knowledge or people's experiences. *Baumo* synergizes the capacity of a certain landscape. It is socially, economically and ecologically interwoven into the livelihoods of the communities.

Umo is a land use system (see Box 1) is based on land suitability. It uses local seeds, does not depend on chemicals, includes local poultry and cattle. The communities obtain animal proteins by hunting in the forest or fishing in the river, judiciously. There are some villages holding on to this system based on *Baumo* values critically reflected in their cultural practices, which are briefly explained below.

In Beselang, people carry out farming activities together. For example, a family invites other villagers both young and old to help them cultivate their land. On a scheduled day, people will show up to *Umo* and help in cultivating the land, together. The host will prepare breakfast, lunch and snacks.

In Pelarian, villagers help each other to cultivate and harvest rice. In this system, only 5-10 people agree to help each other and take turns with fixed working hours. If they agree to work for two days, then every member will get help to work in his/her *Umo* from other members for two days. The agreement also includes who provides the food. Usually every member will bring his/her own lunch, eat it together while sharing and exchanging their food with each other.

Basokat is a social event where people come to pay zakat (donation) in the form of rice (from their *Umo*). In this event, every farmer must donate 10% of the total rice production from his/her farm. The total Zakat collected roughly indicates the yearly total rice production from all farmers. This Zakat will be distributed for the less fortunate people, orphans, and elderly people.

Box 1: *Umo* classification

Umo (land) is classified into three types based on its area or landscape, they are: *Umo Renah* is lowland that is used to cultivate rice and other crops. *Umo renah* is located in the village/housing area, or along the river bank. *Umo Kasang / Umo Talang* is highland that is used to cultivate rubber, rice, durian, duku (*Lansium domesticum*), mangosteen, stinky bean, and other perennial plants. *Umo Talang* is located far from the housing area, around 2-50 km away. Since it is far from the village, usually people build a small and simple lodge, made of wood or other materials found in the area to be used as a place to rest when they work in *Umo*. This *Umo* is also called *Umo Talang* or *Umo Rimbo* (forest) because it is located near forest or inside forest. *Umo Payo* is wet lowland that is used to cultivate rice and horticulture plants, such as morning glory, and after harvesting it is used for duck farms. Farmers let their ducks freely roam the land that is currently known as sawah.

Communities also exchange seeds, voluntarily. They share or exchange rice seed as well as other plant seeds. Sometimes, they even share or exchange other things needed by the community. The seeds they give will be returned as new seeds after harvesting. The purpose of seed exchange is to maintain seed diversity in the community as well as prevent monopoly of one particular seed.

Farmers use vacant land to plant chillies

Shift towards commercialisation

Since 2000, the cropland and rubber plantation areas have been decreasing owing to land conversion into palm oil plantations. The conversion occurs through partnership (between company and farmer) in the form of land acquisition or land sale as well as when the farmers willingly convert their farms into palm oil plantations, expecting higher profits. The growing extractive plantations have directly and indirectly affected food self-sufficiency as well as careful utilization of natural resources. It totally ignored the rich traditional knowledge and local wisdom of communities. Thus, many farmers have left their traditional agriculture practices.

The development in Indonesia is generally centralized as well as top down. The advent of monoculture plantation and large scale mining in rural areas has changed the community life system – its social, economic and environmental aspects. In Batanghari district, Jambi Province, the majority of rural areas are granted business permit for plantation and mining. The establishment of palm oil factories has encouraged farmers to convert their rubber plantation and crop farm into palm oil plantation. The situation is getting worsened owing to adverse impacts of climate change induced unpredictable weather and uncontrollable pest incidences.

These regional developments have significantly altered the land ownership system. Earlier, it used to be 'borrow and use' among villagers. Now, it has turned into a commercial transaction between villagers, and property agents/ rich individuals from the city. Thus, most of the people had become workers in the companies or had to find work outside their village. In 2020, it was realized that 70% of the lands were owned by private companies and rich individuals from the city, while the locals owned residential land, yard and cemetery. The government does make efforts for continuity of food crops to an extent. However, it has not been too effective.

All these developments have significantly affected traditional agriculture

system, *Baumo*. *Baumo* traditional agriculture has changed a lot, affected by commercial agriculture as well as climate change.

PLDP (People Led Development Process) – Empowering communities

Farmers and communities had to gradually and systematically address their situation which was fast going out of their hands. PLDP was initiated in 2014 in Karmeo village and Pasar Terusan villages. They were guided through the PLDP process. The process enabled farmers to learn and understand their situation and their village, to identify opportunities and challenges and how to address them together. The process helped in raising awareness, enabled them to organize themselves, protest indiscriminate land conversion, revive traditional agriculture based on local wisdom, cultivate and access local foods.

It all started with two companies getting location permit in Karmeo village.

The total area of *Umo* renah or rice field in Karmeo is 135 hectares, 75 hectares managed by 168 households or 31% of the total 541 households. Those 168 households are members of 3 farmer groups. The rice from *Umo* is not enough to meet the needs of the entire population of Karmeo village every year, but at least it covers 50% of the total rice consumption in the community.

The company used various mechanisms to acquire land from farmers at a very low price. The companies selected village administration staff and public figures and formed a unit to collect the lands called Tim Sembilan (Team Nine). They succeeded in acquiring 200 hectares land, of which 18 hectares was *Umo* / rice field. Land of rubber plantation and productive *Umo*/rice field was bid for IDR 7 million per hectare, land of rubber plantation and barren *Umo* / rice field was bid for IDR 5 million per hectare, and empty land was bid for IDR 4 million per hectare.

The protest began when The Tunas Harapan Farmer Group invited two other farmer groups to join to fight against plantation company by resisting to sell their lands to them, especially the field or *Umo*. Initially, the farmer groups were afraid and reluctant as their Village Head did not support their plan to protest against companies. Still, by consolidation and joint commitment, the groups sent their representatives to visit the Food and Agriculture Office of Batanghari District. They reported to FAO that the permit for companies to set up plantation on food crop threatens the sustainability of food cropland. As the response was not satisfactory, the farmer groups visited The Regional House of Representatives of Batanghari district, together with other farmer groups from Pasar Terusan village. The Village Head of Desa Pasar Terusan

Organic fertilizer being prepared in Pasar Terusan village

fully supported the movement and was willing to fight together to achieve food cropland sustainability in Batanghari district.

From 2014 to 2015, there were organized efforts in both Karmeo village and Pasar Terusan village. Training events were organized on collective organization as well as integrated non chemical methods of cultivation. The farmer groups urged the village administration to issue Village Regulation on Cropland Protection.

In March 2015, the village administration of Pasar Terusan village issued Village Regulation on "Prohibition of Food Cropland and Horticulture Conversion", while Karmeo village issued Village Regulation on "Prohibition of the use of poison or other chemical substances in catching aquatic animals in the river or rice field"

Towards Regional Regulation

The Village Regulation has motivated farmers to urge the district government to issue Regional Regulation on sustainable agriculture protection. Farmer representatives met the officials of the government highlighting the need and urgency of having Regional Regulation to protect agriculture. Although it was not executed immediately, at least by 2014, The Food and Agriculture Office got involved in the process of issuing permit location for palm oil plantation. The office had the power to verify and to refuse giving recommendation if the plantation is planned in a agricultural land both productive and potential area. Earlier, the permit was solely processed by The Investment and One-stop Integrated Services Office and legalized by the Regional Head (Bupati) without assessment or verification from The Food and Agriculture Office making it easier for getting location permit.

The farmer groups continued their advocacy efforts in villages in Batanghari district from 2013-2015. This resulted in the cancellation of location permit for palm oil companies in Batanghari district. It became an important achievement for the association of farmer groups in raising awareness and building solidarity.

Rice milling during the harvest in Pasar Terusan village

This further facilitated in opening Regional Government's eyes regarding the significance of maintaining croplands to achieve food sovereignty.

The farmers from Karmoe village and Pasar Terusan village supported Mersam village to fight against PT ICA (limited liability company). PT ICA was a palm oil company which had been granted location permit as big as 7,800 hectares spread around 9 villages in Mersam sub-district: Sungai Puar, Sengkati Kecil, Sengkati Gedang, Teluk Melintang, Kembang Tanjung, Mersam, Rambutan Masam, Benteng Rendah and Sungai Lais. This location permit threatened rice fields and water absorption area, rice field in Sungai Lais (69 hectares, managed by 123 households, providing food for 600 inhabitants) and Rimbo Pucat kaki (1,200 hectares) – including 3 villages (Rambutan Masam, Mersam and Benteng Rendah), Rice field (500 hectares, 300 hectares are active) and Rimbo Mangkuang (1000 hectares including Desa Teluk Melintang, Sengkati Gedang and Sengkati Kecil). Overall PT ICA's activity was a threat to cropland and management area of the community.

The farmers demanded an audience with Bupati and People's Representative Council (DPR) and made a petition. This process was covered by press. As a result of this action, the company stopped their cultivation on 100 hectares land and left Mersam village. This is the starting point for Regional People's Representative Council of Batanghari district to draft Regional Regulation on Agricultural Land Protection. Finally, on the 17th of November, 2016. The Regional Regulation No.18 on Sustainable Agricultural Land Protection was issued. Although it has not been implemented effectively, at least now there is restriction for extractive companies to get permit for operating around or inside agricultural land.

Buffaloes are released into umofields to naturally fertilise the land

Revival of traditional agriculture

The farmer groups of Karmeo Village and Desa Terusan Village focused on revitalizing traditional agriculture. Though they could not implement exactly the way former generations did, at least, they have managed to revive it and preserve the values and local knowledge and wisdom to benefit the communities.

Firstly, the 18 hectares of rice field in Desa Karmeo taken over by company through trade was released and the company's permit to manage was cancelled. This situation favored farmers as they actually had received money from selling their land. The total area of rice field in Karmeo Village increased by 7 hectares. Currently, the total area of existing rice field is 182 hectares. Apart from that, there is a horticulture farm as big as 1.7 hectares that cultivates long bean, eggplant, cucumber and chili. Food cropland is cultivated well, and although they begin to use chemical substances, they still preserve the remaining local seeds. The Village Head has extended support for farmers. It is reflected in the way the farmer representatives are invited for deliberations of village development planning every year.

In Pasar Terusan village, though the new Village Head is not one from

farmer groups, the motivation and commitment of the community to keep their food cropland was high. Thus, the new Village Head had no choice but to fully support the community in which 95% of them are farmers, those who manage their *Umo* themselves and also those who hire a person to manage their *Umo*. Their culture of *"malu tidak Berumo, malu membeli beras"* (it's shameful if you don't have rice field, it's shameful to buy rice instead of growing it) is still strongly intact.

There are 10 farmer groups in the village and the total number of households are 804. These 10 farmer groups are part of Payo Kering Farmer Groups Association (GAPOKTAN). They cultivate rice in 38% of the area, in 314.92 hectares out of 825 hectares, with a production of 3-4 tons per hectares every harvest. There are 32 kinds of seeds cultivated, 20 of them are local seeds. A majority. of them, around 60.7% of farmers use local seeds. In fact, in the past three years, with improved cultivation practices, the production has increased from 2-3 tons per hectare per year to 3-5 tons per year. Although rice is generally cultivated only in one planting season, the production is sufficient to meet the consumption needs of the entire community in Pasar Terusan village, for one year.

The farmers could also revive the local system for managing the cattle, supported by Village Regulation too. This traditional practice has been prevalent over a very long time. The cattle are kept in a cage for 6 months from the beginning of planting season, and then released to roam in the rice fields after the harvest. The cattle feed on the residues left after the harvest, act as a natural plough to loosening the soil besides nourishing it.

After three years of long consolidation, the farmer groups successfully urged the Village Head to issue Village

Table 1: Local food crops in Batanghari district

Name	Lifespan	Availability
Karmoe village		
Sanapi rice	5 months	Yes
Tabun Narang sticky rice	6 months	Rare
Jarum Mas rice	6 months	Extinct
Kerupuk eggplant	2- 3 months	Yes
Batok ungu eggplant	2.5 months	Yes
Batok Putih eggplant	2 months	Yes
Besi pumpkin	3 months	Yes
Perenggi pumpkin	3 months	Yes
Pasar Terusan village and Terusan village		
Gadis jambi	6 months	Yes
Karya	6 months	Yes
Keras batang	6 months	Yes
Serendah kuning	6 months	Yes
Yellow rice	6 month	Yes
Kuning kerinci	6 months	Yes
Cino rice	6 months	Yes
Pandan wangi	6 months	Yes
Serendah layap	6 months	Yes
Serendah putih	6 months	No
Padi payo putih	6 months	Yes
Sticky rice	6 months	Yes
Selendang sticky rice	5.5 months	Yes
Sulai sticky rice	5.5 months	Yes
Black sticky rice	5.5 months	Yes
Laut sticky rice	5.5 months	Yes
Long, purple and green eggplant	2 months	Yes
Dedo roan eggplant	2 months	Yes
Light purple eggplant and dark purple eggplant	2 months	Yes
Kisik	40 days	Yes

Regulation on Food Cropland Protection; also allocate some of its funds to build a village hall to facilitate farmers to gather and hold meetings, a warehouse to store farming equipment, and a road towards the rice fields. They promote local food crops (see Table 1, Page 85). The unique characteristics of these local foods has been documented in detail as part of a study and is available with the organization.

Current challenges

While organized farmer associations have successfully addressed land use issues, they are confronted by the push of hybrid seeds by the government with a focus on improved productivity. The government has identified hybrid rice seeds, soyabean seeds and corn seeds as national standard to increase food productivity in the country. With hybrid seeds, the government expects farmers could harvest twice a year.

Meanwhile 65% of the farmers are consistently using local seeds. They believe that local seeds have different flavors and various textures so that farmers could choose which one they like better. They also believe that local seeds are more pest-resistant, need lower maintenance, also threaten their beneficial cultural practices. For instance, Pasar Terusan village has its cultural practice of releasing cattle in the rice fields for 6 months after harvesting. If they used hybrid seeds and plant twice a year, it would mean that their buffalos must be kept in the cage all the time. This would also mean dependence on chemicals resulting in increased costs of cultivation as well as harming the environment.

Farmer groups are looking for support in the following areas to maintain local seed biodiversity - improved R & D in support of local seeds capable of growing in a short period; improved capacities to deal with breeding methods. They are keen to convince Batanghari district government and Provincial government to recognize and acknowledge that local seeds are farmers' assets.

All these efforts indicate how communities have been able to address their needs while keeping the well being of all in their mind through systematic and collective efforts. This illustrates the strength of people led processes in influencing and taking up any challenge and addressing them successfully.

Bhargariya woman displaying a letter of recognition

Promoting agroecology through traditional leadership

■ Keshabraj Ghimire and Krishna Thrau

Active traditional leadership is crucial for expansion of ecological farming in the areas dominated by *Tharu* communities in Nepal. Social Work Institute worked on empowering their leadership and claiming legal recognition for effectively reviving traditional agriculture and chemical free farming.

Social Work Institute (SWI), established in the year 1987, was primarily involved in training people to work in programs on drug rehabilitation, counselling and therapy for the troubled, on child abuse and neglect, project-oriented community development, and income generation and skill development programs. When the concept of "animation", a combined product of Paulo Freire's approach and Liberation Theology, was introduced in Nepal, the institute was one of the first organizations to adopt this approach. Focusing gradually on preparing hands-on social workers, has been conducting long and short-term training and workshops for various target groups. Also, it has been implementing community development programs in partnership with CBOs. Further, builds skills and capacities of youth to work independently.

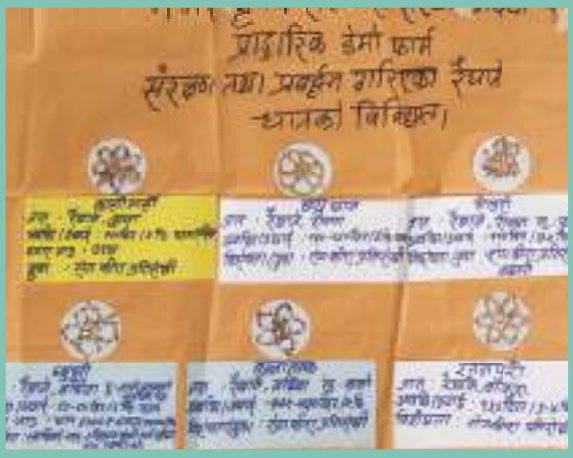
Tharu are an indigenous group based in western part of Nepal. They inhabit the dense forest in Terai region. Other caste groups from hill and mountains gradually shifted to Terai region and captured the land by deforesting and started making *Tharu*s bonded labour. *Tharu*s were defined as 'Kamaiya' and 'Kamalari', the most exploited domestic labour community in the western part of Nepal's lowland Terai plains. In the year 2002, Nepal government emancipated Kamaiya, and Kamalari system, providing them with 2-4 Katha (677.2-1693 sq.m) land per household.

Tharu communities have been living with a traditional leadership system prevalent since ancient times in western Nepal. It is a village level leadership system. In this system, Bargharia, Assistant *Barghariya*, Likhandariya, Chirakya, watchman and villagers play their roles, as defined traditionally. Among them, *Barghariya* is the topmost in hierarchy. General assembly is the body of villagers which provides directions and communities respect and follow them. *Barghariya* system among *Tharu* community was influential with prominent leadership in Bardiya District. However, the limitations were: non recognition of the traditional system by the local government system and lack of knowledge for the Bargharias about the present legal frameworks.

17 varieties of local rice were planted on the trial farm

Social Work Institute (SWI), a non governmental organisation working since 1987 with the communities, took initiative to strengthen the local traditional governance system and through them promote traditional agriculture.

Development vision and the initiative



Varietal characteristics of rice planted in trial farms

SWI believes that the current global crisis affects not only marginalized societies in the Global South, but – at least in the medium and long term – all people as individuals around the world. There is a need to join forces to challenge the structures that block empowerment, self-reliance and self-determination within and outside communities. Only self-reliant communities who control their resources and participate in local decision-making process have the potential to create changes that go beyond the local project level. This can be best achieved by facilitating people led development processes. Open communication, peer learning and creating spaces for experiential learning are the important elements of people led development approaches.

SWI sees development as a transformative process building on individuals and communities existing capacities, knowledge and potential. Development is a joint effort of communities, NGOs and donors working together to achieve locally owned visions and create together locally driven change processes. This means, SWI believes in 'working with' and not 'working for' people. SWI staff, alumni and partners initiate and facilitate development processes in a way that enables transformative energies through reflection, dialogue and joint learning.

When SWI embarked on promoting agroecological model of agriculture with *Tharu* communities through People Led Development process, it focused on empowering traditional leadership. With this vision, SWI systematically went about strengthening *Tharu* communities through the following strategies

a. Getting the traditional leadership system legalized so that they become strong and effective to handle social, cultural, economic and environmental issues as well as agricultural production based on agroecological model.

b. Promoting agroecology through People Led Development process involving knowledge exchange, seed fairs, farmers experimenting and conducting seed trials to assess the benefits; promoting select local seed

Exchange platforms for regaining recognition for Bhargariya community

Bhargar meeting in progress

Bhargar policy handover to communities

distribution for wider expansion of ecological farming.

The initiative was implemented in four provinces, six Rural/Municipalities in collaboration with ten local partners. One of the project areas was in Bardiya District, Badhaiyatal Rural Municipality.

Establishing legalized traditional leadership system

In 2018, SWI first worked on promoting and legalizing *Barghariya* system so that there could be a strong and effective leadership to handle various issues as well as promote ecological agriculture production model.

SWI worked on recognizing, strengthening, and legalizing the Barghar leadership system in partnership with Maigar Community Organization. Based on the discussions with existing *Barghariya*, SWI facilitated submitting application to local municipal offices, for recognizing them as traditional leaders to guide their respective communities. A series of meetings at individual, ward and municipal levels were conducted. Finally, in March 2019, they succeeded in forming a ward level committee in two wards. They expanded their roles and responsibilities and began to collectively handle the issues that came up in their community.

Barghar committee also defined the network modality and process of selection of the Barghar network. After long discussions, Barghar network drafted Barghar Mobilization Act - 2079 for Local Inclusive Local Development (स्थानिय समावेशि विकासका लागि बरघर परिचालन ऐन २०७९). The main demand of Barghars is that they must recognize the traditional leadership of Barghar in various roles – Judiciary role (any family conflicts come to the Barghar and they need to get involved), social role (a say in social events and celebrations) and development role (coordinating village development works). Ward office should recognize and respect their decisions and provide representation in Municipality and

Challenges faced…

"Being a Barghar, we have to visit local governments, police offices and need to coordinate with different organizations. We work as a volunteer. If something happens, people visit us in hope to solve the problems. Sometimes our decision contradicts with national legal provisions that we are not aware of. (For example; legal age of marriage in Nepal is 21 years and many in Barghar do not know that). We need to face trouble if somebody in the community gets married before 21 years old.''

- Ms Bishni Tharu

Asst. BARGHAR Badhiyatal Barghar network & Barghar

Karyapalika (executive committee of local government).

Now there are 36 Barghar in 36 tole and there are 7 ward level networks.

Promoting agroecology using PLD approach

The PLDP process was carried out in the year 2020. The problems were identified through Participatory Action Research (PAR), using tools like Social Mapping, Resource Mapping, Seasonal Calendar (crop season, crop cycle, agriculture practices, migration, food availability), and Venn diagram. Based on the PAR, they also conducted Action Reflection Action (ARA). It was soon realized that people are slowly losing their control over agriculture.

The project was implemented with community based organization called Maigar Community Organization. Maigar Community Organization has a sister cooperative called Maigar Agriculture Cooperative which had already 119 members and 4 women groups. *Barghars*, played effective role in mediating during meetings enabling decision making with regard to each activity.

> "Trainings helped us to understand and recognize our traditional agriculture practices and leadership practices. In the beginning it was very challenging to organize the Barghar. Through several reflection processes during meetings, we convinced people to promote traditional agriculture and traditional leadership together. We have been lobbying with the Local Municipality for promoting Traditional Leadership system (Barghar Leadership System), ecological farming and food sovereignty..."
>
> - Mr. Parsu Ram Chaudhary,
>
> Municipality level Barghar Network member

SWI organized an Agro ecology and Food Sovereignty workshop. Community leaders, group leaders, and cooperative representatives participated in the workshop. Forty people from Badhiyatal Rural Municipality participated. Knowledge exchange was facilitated to understand the local seed practices. Participants got trained on mulching, compost fertilizer making, herbal pesticides and decomposer making.

After the workshop, a one day local seeds fair was held in Sitala Bazar, Bardiya in April 2019, in collaboration with the Agriculture Department of Rural Municipality. It was organized in Sitala Bazar (weekly bazar) at Badhiyatal Rural Municipality ward no 5. During the seed fair, local organizations, farmers and other SWI partners engaged in promoting ecological agriculture were invited. Twenty one farmer representatives of community-based organizations from 6 districts also participated in the fair. There were 75 varieties of seeds (for example; pulses, Ghyupuri rice, Satha rice, Anidi rice, Kalamnamak rice, wheat and vegetables). Three hundred farmers visited and inquired about the seeds. It was a great exposure for the local community about the local seeds and their importance. At the end of the fair, farmers exchanged seeds.

Farmer led trials

Maigar (one of the community organizations) also received 17 varieties of local rice seeds from other farmers. The farmers, in collaboration with Barghars decided to experiment with the seeds. Community leaders and Maigar had dialog with local school management committee which agreed to provide land to start the farm trials. They started experimenting with rice seeds. They planted 17 varieties of rice seeds in June 2019. **Such a trial led by farmers themselves was conducted for the first time in the village.** They kept records of the land each seed needed, water absorbent capacity, their height and so

on. They were very excited to have cultivated and harvested local rice after a long time. They found that 5 varieties performed well. This was the result even without using chemical fertilizers and pesticides. Everyone who was passing through the area started entering the farm and looking at the crop performance. They were attracted to the aroma of the rice varieties too. They also discovered that local rice seeds do not need much organic fertilizer either. It was a great learning, not only for the farmers but also to the Agriculture Department of the Municipality.

Three farmers borrowed three local varieties of rice (Tilki, Satha & Ghyoupuri) from Maigar. These farmers applied chemical fertilizers to the crop (same quantity as they use for the hybrid rice varieties). The rice plant grew very tall and then collapsed. They did not have good harvest. As a result, the farmers learnt that use of chemical fertilisers for the local variety shall affect the crop. They could also sell it at a high price in the market. They used to sell the hybrid rice at Rs. 45-50 but the local rice was sold at rates of Rs. 70-130 per kilogram (Nepali Rupees). They found that Ghyupuri and Satha rice can be harvested 20 days earlier too. Through their own experimentation, based on results, farmers adopted local rice seeds. This year, 20 farmers started to plant the local rice.

Maigar also provided the local rice varieties to 4 other cooperatives (in other districts). One kg to 10 kgs of seeds were distributed to interested farmers to conduct trials, with a condition that they return double the amount after harvesting. Farmers also started exchanging seeds with each other and promoting them.

Maigar also started working for the marketing of local products through *Participatory Guarantee System (PGS).* They established five groups (Badhaiya PGS) in which 70 farmers were involved. The PGS committee developed guidelines for organic production. They have planned to sell their products in the name of "Badhaiyatak PGS brand".

Conclusion and way forward

Traditional leadership system in *Tharu* community is an asset at the local level, which is guided by the principle of 'by the community, for the community.' The leaders (*Barghars*) are the focal persons and change agents to mediate between governmental and non-governmental organizations' programs and projects. Social Work Institute (SWI) worked on empowering their leadership and claiming legal recognition for effectively reviving traditional agriculture and chemical free farming. Thus, active traditional leadership makes it easier for effective expansion of ecological farming in the near future.

Towards achieving food sovereignty

■ SDSS

People have knowledge and resources, and wish to be self-reliant. And, there is a possibility for collectivism for achieving all of these. With this view in mind, SDSS followed a people led development approach to empower communities, help them regain food sovereignty and take charge of their lives and livelihoods. In the process, SDSS too enriched itself with knowledge and insights on the communities.

Onion cultivation at Dodamarg

Photo Credit: SatishThakare

Nomadic tribals like *Katkari* (Wandarmare), *Berad*, and *Dhangar* are seen in Sindhdurg district in Maharashtra, India. These tribal communities do not own land. They depend on their traditional skills like extracting honey, making bamboo products, and pursuing agriculture. They lack community traditional leadership to raise and tackle their socio-economic issues in the existing socio-political system. There are no organizations working with the tribals too. A major factor contributing to persistent poverty amongst these communities is the insecure livelihoods based on bonded labour.

SDSS, an NGO which has been working in Sindhdurg area in Maharashtra, India helping and empowering the poor, started working with these communities in 13 villages in 2016. The initial focus was on addressing the land issues of these people, facilitating them to access government programmes. Work on other issues like traditional agriculture practices, food security, housing, basic amenities, education, drinking water, health care, etc. would follow in due course of time. A need to revive their culture and traditions is also seen as an important factor in mobilizing and organizing the community so that they regain confidence and are proud of their ethnic identity and culture.

The PLD approach

SDSS was following a conventional charity-based approach which was unidirectional with little scope for growth. It shifted to the People Led Development (PLD) approach around 6 years ago. The organization learned about the approach and received it in the form of a project from Caritas India. In 2016, the approach was implemented by engaging with communities, especially nomadic and forest dwellers for the development of their lives and livelihoods. PLDP is a people-centric approach. In this, the organization's role is one of a facilitator, while people are the doers. We believe that people have knowledge, have resources, want to be self-reliant and there is a possibility for collectivism. The main objective is to promote development based on the wisdom that people already have, through collective efforts. In 2016, SDSS was initiated to reflect on the issues with the community to understand their existing resources, and solutions to reduce dependency of the community on external sources.

There are four pillars to our People Led Empowerment process- people with leadership qualities, community mobilizers and facilitators, issue identifiers and other dedicated volunteers working with self-motivated goals towards community development. The project was implemented in 13 villages of 3 blocks in Sindhudurg district, Maharashtra. Five program staff were initially engaged in the new approach. Initially, people didn't accept the approach. The organization got engaged with people to learn more through exchanges. In the process of learning, it was able to find new ways to bring about changes.

Box 1: Ethnic language word collection

Sindhudurg is known for its diversity in food and language. The language used locally is called Malwani. With its unique and enriched nature, jargons and sayings, people use it for better communication. Around 4000 words were collected and collated and preserved for the use by next generation. In this area, a dance called Phugadi is practiced. 72 types of Fugadi Lyrics in Malwani dialects, were also collected.

Mobilising communities

The objective was to raise awareness of the communities to have an identity (documents or caste certificates) for themselves to start with. First, a Right to Forest Committee was established in an ecologically sensitive zone of Amboli. Around 22 applications were submitted. Similarly, at a Beradki hamlet which also falls in the eco-sensitive zone, the community had no basic amenities like water supply, electricity connection, or any kind of entitlement and identity documents. With our initial intervention in this hamlet, we sensitized the community about the government schemes and benefits, especially for education. Twenty applications for caste certificates were written and submitted. The success of these interventions impacted communities positively strengthening the PLDP approach.

For the land rights program, staff conducted meetings and made regular field visits. Activists and experts were invited to discuss the land based issues. People were shown general resolutions of the government and were encouraged to raise questions in the Gram Sabha. Repeated educational meetings resulted in the formation of a committee. Through the committee, people have filed nominations for their land rights. Communities received 40 acres of land in one village. Seeing the success, other villages are also replicating the process.

Cultivation of turmeric and ragi in Kalambist

Photo Credit: Dasharath Paste and Pramodini Desai

Sustainable agriculture and seed diversity

The community is too much dependent on external inputs like seeds, fertilizers, markets, and knowledge. Through the PLDP process, the community is now realizing the demerits of conventional agriculture methods and its impact on family health and livelihoods. The community was exposed to natural farming, compost making and other aspects of farming in areas that had already seen change. Educative videos on farming were shown which were later implemented by farmers on their farms. Around 182 people have participated directly or indirectly and have benefited.

Farmers have realised that seed diversity is important for many reasons. Maintaining a diversity of plant varieties ensures preserving a large range of genetic traits in our food. Seed diversity helps protect large-scale crop failure from diseases. Wild plants and minor crop species serve as healthy food during shortages in staple paddy crop (like Ghansal, Bele, Black rice, Patani) production.

The community was initially not positive towards the traditional seeds. They were apprehensive that the yields could be reduced. However, 46 farmers took the lead. Some planted Ghansal variety of paddy, popular in some of the areas in Western Ghats of Konkan. Two farmers' groups were formed. They started restoring local seeds and preparing biologicals like Jiwamrut, Lamit, Bijamrut etc. The local CBOs also supported the initiative by arranging the resources.

Seed exchanges were organised. People collected and exchanged seeds among themselves. 129 farmers exchanged 23 types of seeds which are locally available (oil seeds, leafy vegetables, food grains etc.).

Food fairs

Traditional ethnic food knowledge is already in the community. More than 300 people participated in food fairs. Some of them started organizing food festivals at various villages through their own contributions.

In 2016, Wild vegetable festival was organized at Sawantwadi for the first time. It was a two day program. Around 2000 people participated. Along with the media, government officials and other dignitaries participated. The program's chief guest was Mr. Suresh Prabhu, then the Honourable Minister of Aviation, Govt of India. He committed that he would give space for local vegetables at all airports in India. With the success of this program, there were many such festivals organized all across the Konkan region getting overwhelming response. *Gavti bazaars* were initiated in all major villages, giving the locals a platform for a direct market linkage to sell their indigenous produce.

Results and Impact

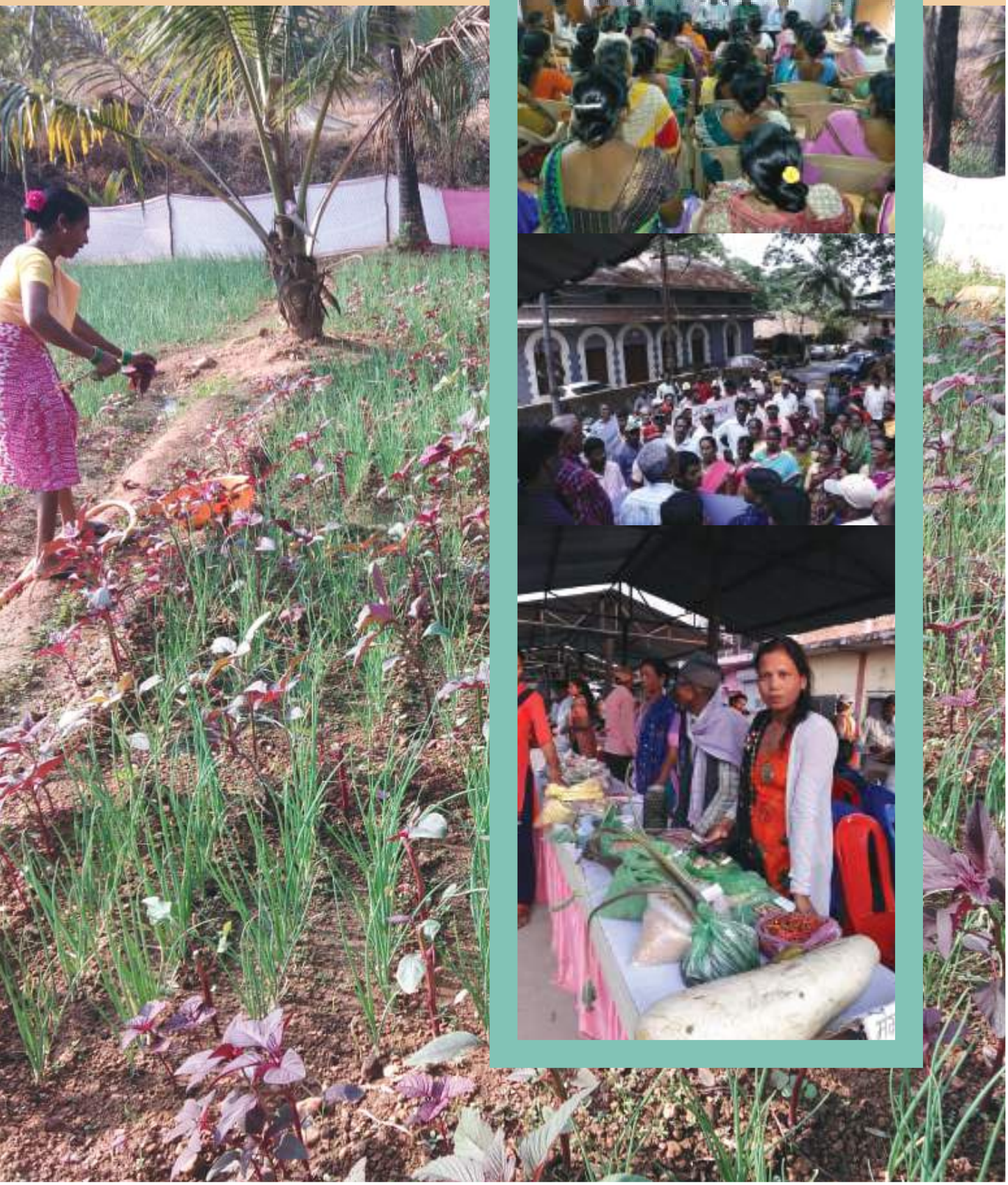
Sustainable agriculture practices ensuring food and income security has been practised in 13 villages. Around 39 farmers cultivated land under mixed food crop cultivation on 30 acres of land in 13 villages. Around 390 farmers cultivated food grains and vegetables, organically. Around 36 farmers produced organic fertilizer commercially.

Now people have their own seeds for their families. Access to seeds has resulted in societal bonding and empowerment among women. For instance, in the month of January, during Sankranti festival celebrations, women are given some small gifts. Last year, 129 women farmers came together and gave local vegetable seeds (Lal leafy vegetable, brinjal, pumpkin, lady's finger etc.) to all other women to plant a nutritional garden in their areas. Now, this idea has become popular in the region.

Community has established people's own mechanisms for the sale and marketing of agricultural products at village levels. A local market that was shut down and had weak networks, got resumed.

Gavti bazaars organised at Kalambist

Photo Credit: Dasharath Paste



Community has been strengthening local self-governance by their active participation in the decision-making process, thus, ensuring their ownership and forging alliances for their own development.

There were challenges too. Initially, it was changing the mindset of communities who were used to receiving help from outside for solving their issues. Moreover, the PLDP process is time consuming and takes time to be accepted. Also, restrictions imposed during the pandemic situation affected the intensity of the work.

As an organisation, we see a sea change in the way we work and think. We feel that we need to empower ourselves first, rather than teaching or guiding the community. We realised that understanding their issues and concerns about the village development was more important for sustainable development than pushing our perspective in handling their problems. We firmly believe that with renewed community insights and participation through PLDP, we can help the communities better in addressing their issues.

Crops are grown using organic methods

Photo Credit: Pramodini Desai

Campaign for local seeds and food sovereignty

Building seed sovereignty

■ Zahoor Joya

The decade long struggle of farming communities in Pakistan culminated in achieving food and seed sovereignty. Seed sovereignty achieved by saving, exchanging, multiplying and cultivating local seeds showcases the strong will of the farmers alliance. With growing access to local seeds, communities could remain resilient, even during extreme climatic aberrations.

Industrial agriculture, a form of capitalism, was introduced in the 1960s in the name of the Green Revolution in Pakistan. Considering the negative effects it had on agricultural production, farmers, people, environment, bio-diversity and livelihoods, we can clearly understand that only rich capitalists' countries, corporations and big landlords benefited. Consequently, our centuries-old seeds became extinct and unproductive, causing severe threats to the health of people. The small and landless farmers were forced to live in hunger and destitution along with landlessness, unemployment and poverty. Also,

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the system of feudal land holding rendered the majority of the rural people landless. The nexus of feudal and capitalist control trapped Pakistan in semi-colonial and semi-feudal mode of production.

Apart from this, the damages caused by climate change also became a source of further destruction for the farming communities. Pakistan is one of the most affected countries by climate crisis for the past several years. In the 2010 Super floods, in which human casualties were 1400, there was heavy loss of livestock standing crops and orchards on nearly 2 million acres of land. Submergence of nearly one-third land resulted in acute shortage of food and fodder; more than 30 million people have been affected with millions left without shelter. The government was ill-prepared to handle the enormous destruction caused due to this climate-emergency. The devastation of the recent heavy rains (August 2022) in Pakistan is considered to be even more destructive than the 2010 Super floods.

PKMT, the Small Farmers Alliance

As a response to the prevailing agriculture production system in the country, an alliance of small farmers (less than 12 acre) and landless farmers, called Pakistan Kissan Mazdoor Tehreek (PKMT) was formed in 2008. PKMT has been a strong proponent of food sovereignty. It strongly believes in the collective strength of small producers in rebutting the impacts of corporatisation of food and agricultural production and free trade. PKMT offers a collective voice to small farmers advocating for seed and food sovereignty, equitable land distribution and a cohesive alternative to globalization.

PKMT is active in 16 districts across three provinces of Pakistan: Khyber Pakhtunkhwa, Punjab and Sindh. The total membership of PKMT is more than 4,000. The organizational structure consists of a national coordinator, three provincial coordinators and a district coordinator for each operational district. Elections are held every two years, with all positions filled based on consensus among the members. The daily management and decisions are made by the PKMT's executive committee which consists of the national coordinator, 3 provincial coordinators and the PKMT Secretary.

Adopting People Led Development approach

A key principle of food sovereignty is a structural change in society which is possible only with leadership taken up by landless and small producers. Therefore, PKMT's initial efforts were to work with small and landless farmers to build a critical analysis of the socioeconomic and political conditions of peasants and farmers, through PLD process.

Just and equitable land distribution is one of the prime objectives of PKMT. This agenda is central in the mobilization and struggles taken up by PKMT. Many studies, education programs, campaigns, protest actions were conducted in the villages across the country.

PKMT has been promoting agroecological approaches based on the principles of food sovereignty. It is centered on farmers' right to land and collective rights to all key productive resources, to create fair, just, healthy and sustainable food systems that ensure safe and nutritious food for all.

PKMT has been contesting corporate hegemony over seed. The control is reflected by the fact that only 3 mega-corporations hold more than 65% of the

Box 1: PKMT on Seed Act

The Pakistan Amended Seed Act 2014 was approved in the National Assembly on March 16, 2015. The seed laws were amended to comply with the monopolistic demands of mega agro-chemical corporations such as Monsanto, Syngenta, Pioneer and others. This is very unfortunate for millions of small and landless farmers of Pakistan. The United States Agriculture Department (USDA) has many times stated the lack of intellectual property to its genetically modified seeds in the country, urging the country to amend its seed and other intellectual property right (IPR) laws.

Pakistan Kissan Mazdoor Tehreek (PKMT) stands against the new Act and has initiated various actions against the grotesque law. It organised signature campaign, protest demonstrations, press conferences etc., before filling the petition in the court against the introduction of amended seed act. In the signature campaign more than 50 organizations in Pakistan took part. The demonstrations/ rallies were done in 16 districts of KPK, Punjab and Sindh. The press conferences were conducted in provincial head quarters in three provinces of Pakistan namely, Karachi, Sindh, Lahore, Punjab and Peshawar in KPK. Inspite of such resistance, the bill was passed by the national assembly and the Senate of Pakistan. PKMT filed a petition in Lahore High Court against this anti farmers seed amended act which is still in progress today.

global seed market. PKMT has developed a broad campaign on fight for seed and food sovereignty. At the policy level, the organization has denounced Pakistan Amended Seed Act 2015 (Box 1), asking for seed laws that promote the rights of small farmers rather than agro-chemical corporations.

Starting with a campaign

After the Super flood 2010, PKMT organized a meeting in collaboration with Roots for Equity (Box 2), to discuss the post-flood issues faced by farmers. Farmers have been using conventional seeds till then. The seeds were lost during floods. PKMT formulated a strategy to promote local seeds, by first collecting them and multiplying them on farmers fields. By 2011, the need for local and indigenous seed bank and a comprehensive campaign on the issues also emerged. To understand the seed bank establishment in more detail, in 2011, PKMT members visited MasiPag, a non-governmental organization in the Philippines involved in peoples seed breeding system.

After the visit, a strategy was prepared to build seed sovereignty. A team was formed to collect local and indigenous seeds from the places where it was still being preserved. The first seed bank was established in 2011 in Matli area of Sindh province. This led to the development of the Save Our Seeds (SOS) campaign, which was launched in all three provinces - Khyber Pakhtunkhwa, Punjab and Sindh.

Box 2

Roots for Equity was formed in 1997 and formally registered in 2000. The organization works with the most vulnerable, marginalized communities that include small and landless farmers, women and religious minorities in the rural and urban sector. It remains committed to being an active part of communities' struggle to achieve political, social, environmental and economic justice.

The campaign's objectives were to:

a. Raise awareness among farmers about the need to save local and indigenous seeds – a critical component of biodiversity.

b. Find local and indigenous seeds that were being preserved in farming communities.

c. Create a political understanding of seed sovereignty as a tool for addressing imperialist control over the seed sector.

d. Mass mobilization and campaign for the right to seed as part of achieving food sovereignty

e. Producing and distributing pamphlets, leaflets, infographics and newsletters for mass awareness and education.

From 2011 to 2012, almost 150 villages in the three provinces of Khyber Pakhtunkhwa, Punjab and Sindh were covered for exploring and collecting local and indigenous seeds. After the SOS campaign, from 2015-2018, at least another 600 villages were approached. Apart from 16 operational districts, PKMT has also been visiting villages from wherever they received information on availability of indigenous seeds. For instance, indigenous wheat varieties were collected from two districts, Dera Ghazi Khan in Punjab, and Dera Bugti in Balochistan.

Building seed sovereignty

PKMT worked towards building seed sovereignty by adopting two approaches – a) Setting up trial farms to ensure mass production of collected seeds and b) establishing seed banks – individually and collectively.

A. Trial Farms

Roots for Equity initiated trial farms in Sindh and Punjab, (and more recently in KPK). The purpose was a) to quickly mass produce the seeds obtained from communities, b) create a backup farm for the seeds obtained by PKMT and c) to demonstrate and promote agroecological practices amongst the farmers in the region. In these trial farms, sustainable agricultural production methods were followed. The purpose is also to encourage the wider community, besides PKMT members, to adopt sustainable agriculture practices.

The Trial farms included two acres of land in Multan and Muzaffargarh, Punjab and

Wheat Seed Varieties		
1.	Aliay	13. Raizam Khan
2.	Barani	14. Rajan Pur
3.	Chagi	15. Rati Wheat
4.	Desi Wheat DG Khan	16. Safiad Wheat Haripur
5.	Faisalabad	17. Sahar
6.	Galaxy	18. Sahiwal Wheat
7.	Inqlab	19. Sattar
8.	Lal Wheat	20. Sindhi Tori
9.	Lasani	21. TD-1
10.	Makhan	22. Ujala
11.	Mulki Rakahni	23. Watan
12.	Punjab- 11	

Seed production enhanced following agroecological approach

one acre of land in Haripur, KPK, in the first year. Multan trial farm land lease contract ended after an year. In the second year, only one acre of land in Muzaffargarh, Punjab and Haripur KP were maintained. Haripur trial farm contract lease ended in 2021.

In the first year, 25 varieties of wheat seeds and 8 varieties of vegetable seeds were produced in Multan trial farm. In Muzaffargarh trial farm, 17 varieties of wheat seeds were produced in the Rabi season; in Kharif season, Jantar (Sesbania aculeate) was produced as a green manure crop to increase the fertility of the soil. In Haripur trial farm, 19 varieties of wheat seeds and 8 varieties of vegetable seeds were produced in Rabi season; in Kharif season, four varieties of maize seeds with vegetable seeds were planted.

In the second year, 24 varieties of wheat seeds were produced, from an acre of land in Muzaffargarh trial farm. In Haripur trial farm, 22 varieties of wheat seeds were produced.

PKMT is also trying to create a market in Karachi and other cities of Pakistan for the wheat flour and rice produced through agroecological practices.

B. Setting up Seed banks

PKMT promoted individual seed banks amongst its members, for building seed sovereignty. The main thrust of the individual seed banks was to ensure that the various wheat varieties that were collected were saved through these seed banks. The central seed committee developed a number of criteria for individual seed banks which included (a) the land would belong to the farmer and could be as small as one eighth of an acre, (b) only natural fertilizers such as animal manure and compost should be used (c) no chemicals and pesticides should be used, and (d) at least 3 varieties of wheat seeds are to be maintained by each farmer. In terms of harvesting, the PKMT seed monitoring committee has stipulated that seeds should be harvested and threshed by hand. By using threshers, different seed varieties were getting mixed with each other. The seed banks were initiated in Rabi Season (wheat sowing season) in all three provinces for regeneration and protection of traditional seeds based on agroecological methods.

In 2018, **Collective seed banks** were established under the supervision of PKMT national seed bank committee. Collective Seed banks on district basis were initiated alongside individual seed banks. In a collective seed bank, one farmer from a particular district provides land for collective seed bank and few interested members of the same district work collectively. The initiative was started with a demand from PKMT members so that they can share their seeds sown in collective seed banks with other members as well as non-members. In each seed bank, 3-5 wheat varieties of local/indigenous seeds were planted by PKMT members.

Campaign for local seeds and food sovereignty

As the years passed, there was also a more systematic effort to look for rice, maize and vegetable seeds. The result was that in 2018, eight years after the super floods, PKMT has 89 individual seed banks across the three provinces in its operational areas. In Sindh, Punjab and KPK, PKMT has 52, 25, and 12 individual seed banks, respectively.

In 2018- 2019, there were twelve collective seed banks - five in Sindh, three in Punjab, and four in KPK. In 2019-20, a total of 9 collectives and 54 individual seed banks were established of which 15 are in Sindh, Punjab-15 and KP-14. In 2020-21, a total of 11 collectives and 54 individual seed banks were established, of which 8 are in Sindh, Punjab-12 and KP-34.

In 6 districts, members have taken up full ownership of the seed banks and are self managed, without the support of PKMT and *Roots for Equity*. It is also noted that in these districts the practices are sustained and encouraged as more farmers are saving traditional seeds and are sharing with other members and non-members. The members also tend to exchange seeds among themselves, across districts.

Impact and beyond

The large number of individual and collective seed banks that are established and maintained by the members clearly show the strong will of the alliance to achieve seed sovereignty. To celebrate the success of their decade long struggle for seed and food sovereignty, PMKT organised a *seed mela* with indigenous seeds from all over Pakistan in Lahore. Though seed saving was a very onerous, slow process, yet it could be carried out by PKMT as the small farmers were willing to save their seeds. There were challenges too. With famers owning very little land, it was difficult for them to earmark land for seed production. Also with the loss of traditional practices, farmers had to be constantly reminded to carry out manual threshing.

One more drawback was that the landless constituency of PKMT was unable to participate in this initiative, as they did not have the most critical resource, the land. This portrayed the absolute need for PKMT's priority in its struggle for equitable distribution of land. Without landownership for farmers, there cannot be sustainable food systems and food sovereignty. In the absence of access and control over resources for small producers, sustainable land use and conservation of genetic resources will always remain elusive goals.

The 2022 floods is a fine example of farmers preparedness toward disaster. By building seed sovereignty through seed banks, farmers who lost seeds during the floods could access seeds through seed banks, established during the past 10 years. This proves that, even when affected by climate vagaries, communities can remain resilient, if they are self reliant in agricultural production, locally.

The clarion call of PKMT has been "*apna beej bachaen gae, companyon ko bhagaen gae,*" which means, "we will save our seeds, and chase away the companies." The stringent political education program being carried out by PKMT is the main thrust behind the success.

PKMT plans to create an agricultural model that uses a sustainable approach rooted in agroecology. Agriculture should be practised in harmony with the environment and local ecology, without harming the soil, bio-diversity and other aspects of the environment. Moreover, the food produced should not merely fill our stomachs but should also give us energy and nutrition. And to achieve the goal, all members of PKMT are working together to access safe and nutritious food for all citizens of Pakistan through agroecology.

Seed exchange initiative at Makawanpur district

Shifting towards agroecology

a group farming initiative

■ Shankar Kumar Paudyal

Small initiatives can bring big results. The group farming initiative promoted among the women in Nepal resulted in multiple benefits. It revived the local seeds, local production and local knowledge. It addressed the issue of migration of youth and more importantly, empowered women socially and economically.

Punwale in Makawanpur, Nepal lies in the Upper Tropical Vegetation and Climate Zone (300-1000 meters from sea level). The community of Punwale has 65 households. Majority of them are marginalized ethnic groups like *Magar Chepang, Tamang* and *Dalit*. There are *Brahmin, Kshetri* groups as well, while *Chepang* is extinct. Majority of the households are below absolute poverty level.

Agriculture is the primary source of livelihoods. Majority of them own less than half hectare of land. Earlier, the region was famous for the production of spices like ginger, turmeric and chilly with other crops grown being, paddy, vegetables, fruit and herbs. While the climate and soils are favourable, lack of irrigation support makes them dependent on rainfall. The traditional mixed farming practices have been replaced by chemical intensive vegetable cultivation. As a result, soils have deteriorated and farmer's dependence on external agencies increased. Local seeds, local production and local knowledge have disappeared. The households have less than nine months of food security from their own land.

In the recent past, the agriculture sector has been facing a severe labour shortage, owing to the youth migrating to foreign lands in search of employment. With youth migrating, agriculture is pursued primarily by women. Women have limited access to government bodies and inadequate technical support.

In such a backdrop, in 2019, Caritas Nepal implemented a project to empower women by promoting sustainable agriculture and agro-ecology in four districts of Nepal i.e. Makawanpur, Kapilvastu, Gulmi and Palpa.

The PLDP approach

Since 1990, Caritas Nepal has been actively empowering marginalized communities. Initially, it used animation approach. Earlier, the organization used to assess the needs of the communities, based on which the communities were provided necessary support and training. Caritas Nepal used this approach for more than one and a half decades. In 2019, it made a shift towards People Led Development (PLD) Approach. Since then, Caritas Nepal has been implementing the projects following the PLD approach in four districts of Nepal i.e. Makawanpur, Kapilvastu, Gulmi and Palpa. This case is about the empowerment of women's group in Punwale, Makawanpur.

In Punwale, a series of discussions were carried out with the community. Subsequently, *"Rikheshwori Women Agriculture Group"* consisting of 16 members was formed. Implementing the PLDP approach with communities was not easy initially. Regular meetings were held. Initially, the attendance was low. Women, even when present, remained passive. The communities expected meeting allowances. To address these challenges, Caritas Nepal intensified discussions. Communities did social mapping to understand the availability of resources in their areas. They gradually started speaking out. Various social issues like community sanitation, domestic violence and other disputes were discussed in the groups and women started to take action in resolving these issues. Also specific need basic trainings were organized for building the capacities of the members. Gradually, in every activity, from planning to implementation, communities became active and participation gradually improved. Action Reflection and Action (ARA) process helped this transformation immensely.

The Regional Learning Exchange Program (RLEP) and Asian People's exchange

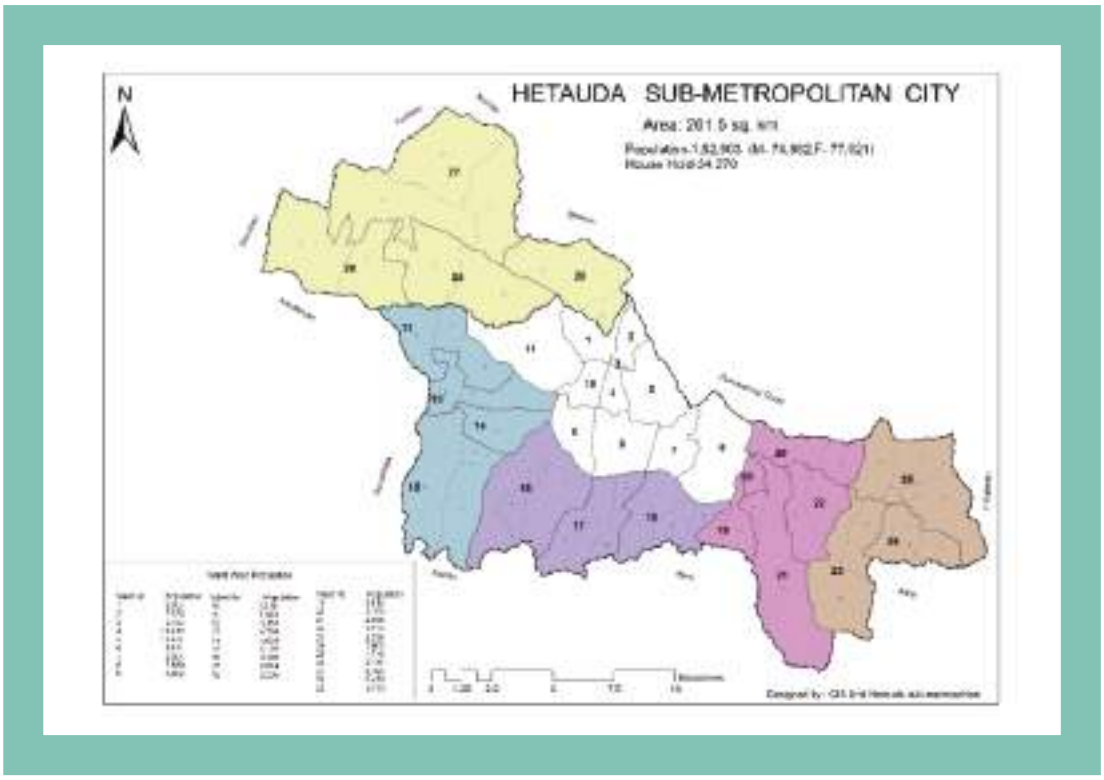
for Food Sovereignty and Agro-ecology (APEX) platforms also helped Caritas Nepal staff to enhance their understanding of the agroecology concepts and PLD approaches.

Initially, the women groups were guided to manage their finances through *savings and credit* mobilization, based on series of discussions during meetings. A committee was identified by the group. A saving of NPR 100 every month by each member was initiated. Loans were mobilized for purposes like agriculture, livestock and other off-farm small enterprises with an interest rate of 12%. Presently, the group has a saving of NPR. 2,00,000. Loans to an extent of NPR.1,20,000 have been disbursed among members. Recently, an Agriculture Cooperative has been established on 26th January 2022 under the name "Shree Trishakti Agriculture Cooperative Ltd." It has a membership of 132 members with women groups from nearby locations joining the initiative. Though it has started savings, it has not yet disbursed loans.

Towards chemical free farming

One of the primary interventions pursued through PLDP approach was reviving traditional mixed cropping of ginger and chilly through agroecological approaches as well as local seed production and exchange mechanisms.

In one of the orientation meetings, women reflected on various reasons for declining agriculture production. They expressed concern over declining soil fertility owing to indiscriminate use of chemical fertilizers and pesticides. This was adversely affecting yields too. Communities realized that they were highly dependent on the external agencies on every factor of agriculture production. Further, government promoting hybrid seeds and chemical farming was seriously challenging introduction of agroecological approaches. Questioning among themselves in meetings helped. "What will happen if support stops from external agencies?"…"What are the consequences of too



much dependency on hybrid seeds and how will it effect their food security"? These questions helped them to realize dependency is not safe, while already available resources if properly managed will help them get better returns.

Farmers realized how chemical free farming helps to improve their soils. As part of the intervention, communities were oriented towards Food Sovereignty and sustainable agriculture. The local partner NGO (Creative Nepal) started guiding them on preparing various kinds of bio-fertilizers like *Bokasi mal (Bokasi manure), Jhol mal (liquid fertilizer) and compost* utilizing locally available resources.

Some of the group members visited field areas of Caritas India (East India and South West India). They got motivated to pursue agroecological farming based on traditional practices and use of locally available resources.

Group Farming

In one of the meetings, the members carried out preference ranking. To begin with, the major problems being faced by the communities were ranked. Disappearance of traditional ginger and chilli cultivation emerged as the major problem identified by the women members. People are relying on purchasing from market what traditionally was grown earlier. The group decided to revive the traditional system. Another challenge they were facing was labour crisis, with youth migrating in pursuit of other vocations. Sensing an opportunity, Caritas Nepal motivated women who were keen to pursue group farming. Group farming initiative was planned with all the members with regard to factors such as land, labour and capital. Coordination with local governmental offices was actively pursued. The group got a subsidy of NPR.1,00,000 from the Hetauda sub-metropolitan city office for pursuing their group farming.

Social mapping by community people at Hetauda submetropolitan city

Women groups initiated mixed farming in 5 katha (1690 Sq. Meter) of land taken on lease in May 2021. They integrated chilly, ginger and coco yam together in the same field. Agroecological practices were followed. Creative Nepal, the local NGO, guided the women members to prepare the botanical pesticide and fertilizer from the locally available resources. They used the organic and botanical fertilizers and pesticides like compost manure, Jhol Mal (liquid manure), farm yard manure, Jibamrit, Bijamrit, cow urine, Neem solution etc. Family members helped in weeding, providing irrigation, fertilizer application and other activities. As a result of excellent team work, 40 quintals of ginger and 6 quintals of chilly were produced in the first season of implementation. Around 1.5 quintals of ginger was distributed to each member of the group. By selling the remaining produce of ginger and chilli, they got an income of NPR. 86,000. They distributed NPR. 45,000 among the group members and kept the NPR. 41,000 in the group. For chillies, they got 10% higher price compared to chemically produced product.

This motivated them to pursue group farming of same crops (ginger and chilly), again. Now, it was done on 8 Katha (2704 Sq. Meter) of land in May, 2022. Ten quintals of seed was consumed from previous season production. They also availed a loan of NPR. 25,000 from their own group with 1% interest rate. This they have already paid back after selling the mother rhizome. In this season, they got 768 kg of chillies. Through chillies sales, they earned NPR. 41,000 and got NPR.36,000 by selling the mother rhizome. They haven't harvested the ginger yet. The members are expecting to get higher profits than previous season.

> "The implementation of PLD approach project by Caritas Nepal has brought out so much confidence in the women members. Earlier, we were only bound to the household chores, but now we are the ones making decision and taking initiative on different community issues. We also revived indigenous way of mixed farming of local ginger and chillies and we have also made profit from it."
>
> - Chairperson, Women's group

Local seed production and exchange

Women members were keen on reviving local seeds. Seed exchange programs were organized twice in collaboration with 8 other women groups. In total, 96 women members exchanged 32 varieties of local seeds of pumpkin, maize cucumber, mustard, beans, soyabean, okra, luffa gourd, buckwheat, peas,

Harvesting ginger with the help of family members

black gram, millet and paddy. The seed exchange enabled women members to not only access seed but also in saving money usually spent on buying seed. They have also revived the lost local varieties of maize and pumpkin. The network of women groups have also established community seed exchange center in 3 locations of Hetauda.

Conclusion and way forward

PLDP approach has enabled women to gain self confidence and communicate and negotiate impressively. They are able to visualize and implement their plans. Besides forging strong bonding among themselves, they are able to help each other in need. They have also taken action on various social issues like domestic violence, gender equity, and community sanitation and so on. It has helped them in taking responsibility of resources take decisions. PLD approach helped the women to identify their common good, widen their own perceptions and knowledge through learning and sharing among themselves, forge collectivism, shared ownership and explore new possibilities.

They have transformed themselves from chemical farming to chemical free farming. They have become skilled at preparing botanical pesticides and

fertilizers, for use in their field, thus bringing down farming costs. They have taken up interest in establishing small enterprises with the help of savings and credit mobilization.

The traditional cultural practice of Parma/Pareli (labor exchange in need) has also been revived and resumed.

Through ginger chilli farming they gained profits, self sufficiency and self reliance. *Rikheshwori Women Agriculture group* has become a role model inspiring others. Two other women groups have started group farming. The local government too is encouraging the initiative by providing technical support when needed.

The future plans include continuing group farming and pursuing postharvest and processing of this produced crops. They also plan to make their cooperative stronger in coming days.

Women preparing ' Jhol Mal', a liquid manure

People Led Development approach

a journey of mutual learning

■ Caritas Da Lat

The People Led Development process results in a mutual learning experience for the communities, as well as the supporting organisation. The experience of Caritas Da Lat showcases that though time consuming and challenging, the PLD approach empowers people at all levels in terms of knowledge building which is sustainable and enriching.

Caritas Đà Lạt, a Catholic organization belonging to Đà Lạt Diocese was established in 2008. The mission of Caritas Dalat insists on holistic sustainable development, protection of every human life and the preservation of the dignity of every human being, care for the environment and living witness of love to actions through charitable activities. Its core values are self-reliance, participation, harmony with nature, justice and peace, love, honesty and respect.

Ethnic minorities are one of the prioritized target groups of Caritas Dalat. They are poor in terms of literacy, little access to information and public services such as health care, clean water, education and resources. People are facing a series of issues such as the increasing pressure of population growth, the decline in natural resources and land grabbing. Their cultural practices sometimes are considered as backward. Modern agriculture was introduced in remote areas around 25 years ago. The consequences of monocrop and intensive agriculture are perceived as reasons for soil degradation, erosion and water pollution. The biggest challenge farmers are facing is rising debt, caused by increasing expenditure on fertilizers, seeds, pesticides and food.

PLD-the beginnings

In the early years of its establishment, like other Caritas dioceses, Caritas Đà Lạt (CDL) struggled to build its mission vision and strategic plan. Having read about the concept of People Led Development in a magazine 'we dance with what we have' published by MISEREOR, Ms. Phuc, Deputy Director of CDL, was very curious and was attracted towards the approach to development, in which farmer was at the center.

The first exposure to PLD was during a Learning Exchange with Caritas Chang Mai in Thailand in 2012. Getting in touch with MISEREOR consultant, Mr. Emmanuel Yap, helped Caritas Đà Lạt to link with MISEREOR. This led to an opportunity to participate in a Regional Learning Exchange Program in Southeast Asia. This was organised by Caritas Asia and included trips to Cambodia and Thailand. This resulted in a little knowledge about sustainable agriculture, with focus on the SRI rice technology and learning on compost production.

The next learning step was an exposure visit to India on PLD in 2013. However, the example of India with the focus on "traditional agriculture" was too different from the Vietnam situation. Due to the long period of socialistic working, much of the old traditional farming practices have been lost in Vietnam. They did not know how to make use of the learnings and examples seen. They could not learn a lot from this trip.

Phases of learning

Phase 1 : Understanding communities, building rapport

In 2014, when the first PLD funding started, a totally new team was recruited, without a background in sustainable agriculture or sociology. We were really challenged in transforming the role of staff from being an 'expert' to a 'change facilitator'. There were a number of questions from farmers to the community staff, like, what should I do to treat my crop? How to control those pests and diseases or can you say if my garden is designed good? and they expected answers from us. Now this process had to be changed. We had to stop giving advice based on our own understanding and perspective. We had to help farmers find answers by themselves. The answers they were waiting from us became the answers they found within themselves, from other farmers. All this meant that we had to unlearn a lot.

We started by associating with 6 communities - staying, working and learning from the people. After a while in socializing, we then didn't know what to do

next. We tried using certain tools to understand their situation better. We used the problem tree tool to start with. But we did not know how to find solutions. We got stuck in the tool itself. The staff could not understand or prioritize community's problems. Though nothing substantial could be achieved, the process of community integration helped in creating good rapport with people and made people understand us better and trust us more.

Then, we facilitated learning exchanges - from community to community, from farmers to farmers. The unity and spirit among community members increased. Farmers after returning from these exchange visits, got together and prepared action plans for collective actions.

As a leading organization in Vietnam on PLD towards agro-ecology, we had the challenge of not having a practical training center on agro-ecology. Successful agroecological models in the region are also rare. So, in 2016 we visited Tan Thanh to learn from a model of growing coffee with grass (coffee plantation with no spraying of herbicides but keeping grass to protect the soil). Starting with an agricultural engineer, Mr Tam who adopted this model, it spread to his relatives and acquaintances. Now, many people around them follow this model of coffee production without using herbicides.

Farmers were divided into 3 groups and were led by a farmer guide. They visited 3 farms and had good interaction and discussions with the growers. Mr. Tam explained the technology followed, in detail, to maintain good quality of coffee crop. He also explained the benefits of growing grass which includes keeping the soil moist, nourishing the soil organisms, protecting soil from erosion and maintaining soil fertility. As grass itself is cut and incorporated into the soil, the use of fertilizers reduced. Also the micro environment becomes cooler and cleaner and walking in the field, becomes a pleasure.

Returning from the trip, farmers shared their knowledge with others in the group. Then some of them started experimenting on a small area in their garden.

Phase II : Learning from each other

The second phase of the project during 2016-18 is considered as a turning point in the learning trajectory of the organisation. The staff participated in the Regional Learning Exchange Platform in South East Asia (RLEP), which helped in understanding PLD much better. We had the opportunity to deepen our knowledge and skills on food sovereignty, community organization, agroecology, PLD principles and Participatory Action Research (PAR). Staff members were also trained in facilitating skills, help people prioritize their problems and participate in research to find a common and consensus solution. Practicing these skills took time for the staff to become more professional.

The way of working and making decisions in Caritas organisation saw a great change. More people were involved in decision making in the organisation. In events, seminars, all employees were given an opportunity to facilitate and present their work, to improve their skills. Monthly meetings, professional training events and internal training sessions served as opportunities for the staff to build up their skills as development workers.

Some *training seminars* on the climate change, impacts of synthetic fertilizers and chemicals in agriculture, food sovereignty, organic production etc., were also conducted. People could observe and experience the difference in soil

quality between forest land, non-herbicides coffee growing land and the land of coffee plantation using herbicides. *"After the training session, I felt scared when seeing how the residue of chemicals in soil, water, plants, affects our health"* Me Khuyl confided. In Đinh Trang Hoa, after the training of food sovereignty, farmers started to plant more food crops on their coffee farm. They also exchanged and preserved indigenous seeds and shared with others.

In 2019-2020, with the experience gained from RLEP, CDL facilitated *Learning Exchange Platform (LEP)* between different target groups - (1) For new communities (CLEP) (2) for communities already having products (SLEP), (3) for people with disability (KLEP) (4) for Caritas network (MLEP). LEPs are a series of training workshops that include indoor sessions and field visits for participants to learn, reflect and take action.

For the CLEP 1 in Dinh Trang Hoa, organized during July 2020, 3-5 members from each community participated. After returning, 2 participants from Ma Danh shared their experience with the community. *"The land in Dinh Trang Hoa is slopy but the coffee crop looked good. They leave the coffee husks in the soil. Inspired by it, I decided to try and intercropped avocado in the garden. Now it's almost harvested,"* said cha Duan. Similarly, Me Kiet, also from CLEP1, is very pleased with the community spirit, hospitality and cultural practices still preserved in Dinh Trang Hoa. After her return, she mobilized people to form a group. On alternate Sundays, the group including men, women and children met and practiced traditional songs and dances. Performing arts bring people closer to each other and the spirits are uplifted after days of hard work. The musical group was also recognized by the church and the parish priest invited them to perform in exchanges with parish's visitors.

The group which participated in CLEP, shared and showed their fellow friends how to make the bio-concoctions and compost using coffee husk. Many households, were inspired to prepare and use compost and gradually reduce the use of chemical fertilisers. The stories shared from Dinh Trang Hoa also made a great impression on people. Me Nhen shared that *"Ms. Da faced difficulties when implementing this method for the first 2 years. The coffee trees turned yellow and the yield decreased. But she persisted in continuing it. After 2 years, plants recovered and became green."*

"Our main occupation is growing rice. The traditional varieties are lost a lot. In addition, 2 years ago, we noticed that there was a shortage of seeds in the market. We realised that we need to have our own rice variety. We were determined to learn how to select and breed varieties, suitable to our climatic and soil conditions. And we also know that this is not a short term job", said Khuyl's mother.

Phase III : Insights into practical experiences

In 2020-2021, we got an opportunity to learn about Participatory Action Research (PAR) in the context of PLD, through the MISEREOR consultant Ms. Elizabeth Cruzada. A series of training sessions helped in gaining awareness and comprehensive insights on practical experiences on PLD. Exposure to more practical examples of APEX partners through exchanges also inspired us to adapt and try in our local conditions in Vietnam.

PAR study was taken up as a pilot at Katip. The study was conducted on four Saturday afternoons, when people could find time together. The villagers analyzed the current situation of the village by using tools like historical time line, village resources mapping, seasonal calendars. Also, they analyzed

household income and expenditure. Main issues of the village were identified. Two of them were prioritized - lack of cultivation technology and high production cost.

Interest groups, each with a team leader, were formed. They prepared plans for collective action. Each group focused on different theme/activity - (1) grow coffee with grass, and reduce the use of chemical fertilizers, making compost (2) promote home gardens (3) cultural preservation and development (4) participate in learning exchanges in agroecology (5) promote improved nutrition and reduce junk food for children (6) experiment with selective varieties and learn how to breed rice varieties.

Learning from Tan Tanh farm

Unfortunately, COVID-19 affected the region and became severe during the second half of 2021. The plans and results from PAR, could hardly be implemented. However, after the Covid period, the rice breeding group approached Caritas and requested to follow up those plans. CDL then connected them with rice breeding program of MASIPAG, an organization consisting of a network of people and scientists in the Philippines with rich experience in the selection and breeding of rice varieties. Dr. Chito, an expert from MASIPAG, who visited Vietnam during May 2022, trained farmers on the process of selecting and breeding new rice varieties. Farmers conducted trials with 20 rice varieties (10 varieties from the Philippines, other 10 were collected locally) in an area of 45 sq.m. The experimentation ignited people's passion for collecting and keeping the seeds for testing.

Some outcomes

Following are some of the outcomes of facilitation done by CDL.

a) A group of 11 farmers named *Iem Goh Churu* was formed in Tutra which produced organic vegetable products. Group members were organised to run the cooperative which they registered later in the state. They were trained in CFGS (Carias Da Lat Farmers' Guarantee System), a PGS system developed by Caritas Đà Lạt, and got the certification in 2019. Some members got trained to become an inspector to monitor the group members. With the CFGS certificate, 80% of the produce was sent to PROCI, a social enterprise in Hochiminh City, thus, easily marketed. More and more people got to know about the group and some volunteers offered to help *Iem Goh Churu* on marketing and branding. Local government supported them to get Vietnam organic certification TCVN in 2021. They also got a fund from a private company to build a small processing unit to dry products. The group plans to expand the membership.

Learning from Dinh Trang Hoa farm

b) The Dinh Trang Hoa community is one of the first communities that we worked with. Ohmi Koho, a coffee cooperative was formed in Dinh Trang Hoa in 2018. They invested in roasting machine and grading machine. However, they were facing issues like unstable orders, weak marketing skills etc. When the government recognized that there existed such EM cooperative in the region, the group was promoted. Many journalists and broadcasters came to record and tell their stories. The cooperative participated on the startup competition organised by the Women's Union of Lam Dong Province in Nov 22, and won the third prize. Gradually, more people got to know the group. The farmers took the lead in preparing a project proposal and submitted to CARE organisation. Having won the project, with the support of CARE, they have now expanded the processing area. Group leaders are more confident and are taking the lead to go further. They are in the process of getting CFGS certification. Presently, they host many learning exchanges for groups of farmers. They are excellent in inspiring farmers in redesigning mono cropping of coffee farm into intercropping, coffee processing and building up solidarity in the community.

c) Traditional house and gong group in Loc Tan 2 is yet another successful outcome. Seeing that the indigenous culture was gradually being lost, the people decided to rebuild the stilt house, set up a group of gongs to play in the village's traditional festivals and teach the young people. After a period of operation, the group was known by many people and sought to hire their performances. These activities made the community more

proud of their culture and helped them have an additional source of income. The practice of traditional culture helps to maintain the group solidarity on the long journey towards agroecology.

The learning continues

PLD journey towards agroecology in Vietnam has been a long and challenging journey, especially for a pioneer in the region, who had to create a road for itself. In the absence of role models, CDL had to make this happen through learning from each other. PLD approach brought communities together, who shouldered responsibility for resolving their issues. By working together, it was a mutual learning experience for CDL and the communities. The concepts of food sovereignty, agroecology and preserving culture and indigenous knowledge become clearer to CDL as well as farmers. On the national and regional level, Caritas Đà Lạt became well known and established close relationship with more institutions such as local Church, local government, Caritas in other dioceses, and with other NGOs (DWC, CENDI, CSDM, CEPHAD, MASIPAG…). This has further helped the organisaiton to network, get exposed and learn from various experiences.

Revival of uncultivated foods

■ Pavel Partha

Uncultivated foods, which are highly nutritious and healthy, constitute an important component of the local society and culture. Farmers in Bangladesh, with the support of BARCIK have developed and strengthened their own food culture, effectively contributing to the rural food economy of Bangladesh. And this is an outcome of the People Led Development process.

Uncultivated plants grow naturally in the land as wild (yard, wetlands, forest and other fallow lands) without any intervention by humans. The plants grow naturally creating a healthy and sound ecosystem. They keep the ecosystem healthy and sound by being sources of foods for other living organisms too, besides the humans. Uncultivated foods constitute an important component of the local society and culture. The foods from these plants are highly nutritious and healthy. Many of these plants are considered sacred for use in religious festivals.

However, humans are responsible for their loss and extinction. National programs and policies neglect them. In Bangladesh, uncultivated foods such as leafy greens, tubers and wild fruits form an integral part of daily diets of many rural households. They also serve as nutritious feed

for the livestock. They serve as folk medicines for common ailments such as headache, swelling, wounds, scabies, and digestion problems. Thus, they meet the food, nutrition, medicinal and cultural needs of the rural people.

BARCIK, an NGO, through its different development interventions, has been motivating and encouraging rural people to conserve and protect the uncultivated plants. By organizing campaigns, fairs, cooking contests and demonstrations, BARCIK has emphasized on the importance of uncultivated food plants which serve as food, medicines and symbols of cultural and religious celebrations.

BARCIK has been working with indigenous communities like *Munda, Bagdi, Garo (Mandi), Hajong, Lyngam and Rabidas* across 7 Agroeconomic Zones in Bangladesh. It is through the interventions of BARCIK that the rural people in its working areas now are taking action to protect and conserve the uncultivated food plants and many people have come to know about the food and medicinal value of these plants.

People Led Development approach

BARCIK has been traditionally working with rural people guiding them to take leadership. BARCIK has been primarily focusing on intensifying indigenous knowledge and practice; conservation of local biodiversity; strengthening mutual relationship, assistance, communication and sharing; exchange of knowledge, experience and resources; promoting low cost development initiatives.

The principles of People Led Development (PLD) are central to their development approaches. It believes that PLD is a process of sustainable development which utilizes peoples' views, knowledge, experience, practices, and resources for all issues relating to their own development.

People are encouraged to organize themselves in groups to bundle capacities, resources and experiences. Groups are stronger to stand for the interests of their members, can better solve problems and can negotiate progress with other actors. Groups are formed based on *occupation* - like farmer groups, on *gender* - like women groups and on *age* - like the youth groups. BARCIK supports initiatives coming from the people themselves, as these have proven to be more effective and sustainable. For instance, it supports farmers conducting

Display of wild foods at household level

Sharing of genetic resource with neighbours

research to improve their seeds or women experimenting with improved ovens. For some of them, this is the starting point to engage more continuously and ultimately start some form of organized groups.

Initially, monthly meetings were facilitated to review the current situation, discuss problem solving approaches, monitor the progress and plan activities. Appropriate methods and capacities to plan, monitor and manage groups were introduced and strengthened through "Participatory Learning and Action" toolboxes, relevant to local context and needs. Gradually, people learnt how to develop effective plans and improve monitoring of their development initiatives.

Raising awareness

Uncultivated food fairs are organized at village level. The fair showcases the diverse uncultivated food diversity of the area. People of different walks learn about uncultivated foods and food diversity. Village women and poor people from economically disadvantaged areas are the knowledge repositories of uncultivated food diversity. During fairs, their innate knowledge and skills get highlighted. By honoring them, social recognition to them and their knowledge gets enhanced, in turn, leading to better social cohesion. This in turn strengthens their ability to survive in times of crisis.

Every Friday, a free herbal clinic is arranged, for people to understand the importance, use and efficacy of uncultivated medicinal plants. The event also serves as an opportunity for people to understand the relationship between nature and life and the contribution being made by those preserving them. This motivates them to nourish and protect the uncultivated plants which contribute to better primary health care and treatment.

Women are the key conservers of wild food

Another important event conducted is a cooking contest. Through this program, village women cook one type of uncultivated vegetable, one by one. People who are nutrition teachers of local educational institutions, public representatives, youth representatives, representatives of public organizations, journalists etc., play the role of judges in the competition. The judges assess the taste and nutritional value of the cooked foods and share their views with the audience. With teachers informing the students about these uncultivated food sources, interest is generated among the youth and local public representatives about their importance. Thus, positive attitudes and perceptions are created among younger generation who are generally caught in fast food cultures.

Conservation initiatives on the ground

Uncultivated food diversity is a practice of biodiversity conservation based on indigenous knowledge. Practical *farmer led agricultural research* programs, at village level, are being promoted to conserve and protect these plants. Here, uncultivated plants are conserved in small plots by the farmers.

Some plants are disappearing from different areas due to climate change and implementation of various environmentally destructive development

Box 1: A case of Alpona Rani Mistri

Alpona Rani Mistri (48) a rural innovative farmer is living in the extreme saline zone in Bangladesh. She belongs to Village Dhumghat under Iswaripur Union of Shyamnagar Upazilla of Satkhira District. It is one of the most vulnerable areas due to climate induced disasters. She was born in a rural poor farming family and got married early. When Alpona entered her conjugal life, her husband already lost their inherited land property. It is very difficult to survive for a four member family without any permanent income. Alpona started focusing on her homestead garden. Her husband was involved as a labourer and migrated occasionally in search of work. Alpona was also occupied as a day labourer in share cropper's rice field. In 2009, they lost everything including their house owing to devastating cyclone, Aila. Not only their agriculture lands, even their 33 decimal homestead land, got affected by saline water.

Alpona started cultivating some vegetables in her homestead after Aila but faced shortage of local seeds and organic inputs. In 2012, she participated in a village agro-biodiversity fair facilitated by BARCIK. She contacted the farmer organization facilitated by BARCIK. She got some local seeds of different crops, received guidance on organic farming. She developed an integrated agricultural plan and began her journey in her 33 decimal homestead land.

Alpona Rani while keenly improving in her skills grew confidence too. Besides production, obtained climate adaptive crop varieties and practised resilient farming techniques. Started experimenting on bean diversity, she has conserved more than 50 uncultivated food plant species. She demonstrated for the first time seed multiplication of uncultivated food plants in experimental plots. She formed a women group named `Shapla Nari Unnayan Songathan'. Through the organization, poor women from different villages got seeds and natural manures. Currently, she is growing seasonal vegetables in an organic way and rearing livestock. She has planted rare trees, medicinal plants and fruit trees in her surroundings. She is producing vermi-compost and botanicals and selling to other farmers. Alpona has pioneered introduction of energy saving friendly oven in her village. Now her village is recognized as `friendly oven village''. Alpona is also practicing 'traditional healing' and helping poor people with free primary healthcare.

Alpona got first recognized as an inspiring farmer in a public program organized by BARCIK. She received lot of awards and recognition at regional and National level. She received National Agricultural Prize from the Honorable Prime Minister, crest from Agricultural Department and National Women Award. Getting recognition within the family, her husband returned back home leaving his daily labor work. Now, they are practicing sustainable family farming.

Alpona has organized rural women and formed a women change maker group in her village. Agricultural department has already acknowledged her contribution by involving her as a trainer in their organic farming training programs. She is also handling several trainings and activities in BARCIK. She is helping rural families in expanding organic farming. She is gaining legitimate space in local government and local administration decision making processes. She is considered as an iconic farmer promoting sustainable farming in the national media of Bangladesh.

projects. To conserve and protect these plants from extinction, *action research* is being conducted by farmers. An assessment is made to see which plants are performing well under current climatic conditions. Such plants are identified, nurtured and conserved by farmers as natural diversity is one of the main weapons in dealing with the climate crisis. Further, awareness is raised in national and international forums for policy support

Reaching the urban and beyond

The agricultural education curriculum of Bangladesh is mainly market driven. Youth are reluctant to learn beyond text books from the environment and nature. In response to this crisis, BARCIK organized a series of lectures and fairs (known as nutrition hawker) on the importance and introduction of conservation of uncultivated plant diversity at the school level. The students are taught by a poet or a village woman along with the teacher of the respective subject. Young minds were made aware of uncultivated food diversity. With enhanced reverence towards farmers and farming communities, the younger generation get to know how to conserve and protect the uncultivated food plant species.

BARCIK ongoing facilitation processes includes systematically identifying and documenting the ethno taxonomic characteristics of uncultivated plant species from each area. Different events have been organized through electronic, print and social media to create mass awareness. The State departments and educational institutions have extended cooperation and supported organization of dialogues, exchanges, seminars, press conferences at different levels among people from different backgrounds. BARCIK also facilitated workshop events to train youth in documentation where village farmer, *Kobiraj* (traditional healers), fisherman, *Bonjibi* (People dependent on non-timber forest product) facilitated the sharing. BARCIK believes in food security of all life forms including humans, therefore, organizes programs which highlights these dimensions.

Conclusion

A total of 120 species of uncultivated foods have been conserved by women groups involving 50000 families. The most significant highlight of this initiative is that around 40000 youth are engaged in the conservation efforts.

Uncultivated plant diversity promotion is contributing to the food and nutritional security of marginalized people. It is enabling each area in developing its own food culture according to its local context, effectively contributing to the rural food economy of Bangladesh. Thus, farmers are contributing to the development of people's own food culture which is an outcome of the people led development process.

Uncultivated species used for foods can thrive without harmful chemical fertilizers and pesticides. As it is based on local and indigenous knowledge, they are aware of their medicinal uses to fulfill the needs of their health and body, thus providing basic and inexpensive health care, their efficacy proving useful in pandemic times.

Activity planning by Vikalpani members

Rural women as enterpreneurs

restoring food systems and creating markets

Chathu Sewwandi

Vikalpini, a women's network in Sri Lanka, through a continuous community engaging process, empowered women, socially and economically, thus reducing their vulnerabilities. The collective experiences and individual cases highlight that women farmers can collectively handle and take control of every aspect of production, marketing and value chain to maximize benefits.

Monaragala is situated about 170 kilometers east of the capital city of Colombo in Uva province in Sri Lanka. Monaragala is a multi-ethnic region with high poverty levels. The main occupation of the community in Monaragala is agriculture, following the traditional slash and burn system since generations.

Most of the farmlands are rainfed with supportive irrigation from small local non-perennial streams. In the dry season, most of the streams get dried up and farmers have to depend on the irrigation water distributed through small ponds. Most of the farmers often face difficulties in farming due the lack of rain and long droughts.

Further, Monaragala is also known as one of the areas where foreign private companies, like Booker and Dole Lanka, started massive contractual farming projects, marginalising the local people. In 1986, an American company called, Booker came in to an agreement with Sri Lankan government and started a massive sugarcane plantation project in some of the areas in Monaragala districts (Pelwatta, Sewanagala). Farmers lands were grabbed despite the people's resistance and farmers had to become labourers in their own lands. Farmers were not allowed to cultivate any crop other than sugarcane. They were allocated 4 acres of lands to cultivate sugarcane and ½ acre of land to settle.

Livelihoods and lifestyle associated with traditional cultivation practices changed with the introduction of sugarcane. Exposed to high levels of pesticides and other agrochemicals in the sugarcane farmlands, farmers started facing numerous health issues. Owing to high costs of production, farmers became indebted. Also, the income from monocropping farming has gradually reduced, making farmers economically vulnerable. Their vulnerability has further increased due to the recent economic crisis, as well. The economic crisis has exaggerated the poverty issues. The self-sufficient food system at household level gradually collapsed due to high prevalence of commercial farming and monocropping. Farmers, especially women, became labourers on these commercial farms. With the collapse of self sufficient food systems, many children faced nutritional deficiencies.

Resisting massive commercialisation of farming, Vikalpani, a women's federation, started promoting agroecology since the 1990's. It worked with the women in Monaragala districts by facilitating diverse training programs on agroecology. All these women meet once a month in their village level group meetings. They discuss the work done and plan future action. They started their own savings and credit system, to meet their financial needs and save themselves from falling into microfinance debt traps, led by private companies. Also, these women are politically aware and active, leading political discussions as well as campaigns.

By 2016, 50 women farmers under 5 sub-groups got trained on agroecology on aspects like pest management, land preparation, organic input preparation, crop management and post harvest management. Today, Vikalapani has around 100 women members who are organised into 11 sub groups. Some of these women have emerged as trainers in the communities, promoting agroecology.

Box 1

Historically speaking, the people in Monaragala district were colonized for agricultural purpose in 1948 under the agricultural colonization program which was led by former agriculture minister D.S. Senanayake. Under this project landless people were invited to move to Moaragala district and they were distributed 5 acres of upland and 3 acres of mud land for cultivation. The lands were cleared by the government and distributed with a house to settle. Many unemployed youth came to the area and settled with agriculture as their main occupation. The purpose of this agricultural colonization program was to enhance the effective use of forest land for food production and involve the unemployed communities particularly youth in agriculture.

Damayanthi of Niyedalla women's group in Monaragala, selling her organic harvest at the farmers' market

PLD process – the beginnings

Vikalapani became part of the RLEP program in 2018. They even hosted one of the PLD workshops in Sri Lanka in 2018. The leaders of the Vikalpani participated in this workshop and were exposed to the PLD process. With the interest in PLD being ignited, the staff members and community leaders participated actively in the workshops conducted in Indonesia, Nepal and Philippines. After Vikalapni became a partner of APEX platform, they learnt more about the PLD process while knowing each other's experiences. Those who directly participated in these workshops shared their knowledge at ground level with women farmers in their group meetings.

Meeting of Sama Mawatha group

Believing that PLD is a sustainable approach in finding solutions for diverse ground level community issues, it took it up with further vigour for collective decision making. The process involved mapping issues, looking at origin of issues, analyzing available resources, and potential collective solutions. Earlier, while the community engagement practices were primarily joint discussions and collective decisions, PLD's Participatory Action Research (PAR) involving Action-Reflection-Action helped in addressing issues at ground systematically. The process was further strengthened through exchange visits, rigorous discussions on contentious issues, inspecting and observing each other's farmlands, learning from each other's experiences through extensive sharing.

Exploring markets

In 2020, Vikalpani conducted a PAR with its members for finding solutions for their market needs. They were prepared to venture into an area like markets, and challenge the patriarchal market ownership.

The women of Vikalpani have been generally small scale producers, producing mainly for home consumption and may be small surplus for selling. Once the small scale producers found production levels getting bigger, owing to aggregation, they wanted to find markets for selling their products and opportunities for value addition. They wanted to explore collectively. They were interested in improving economically as well as to fulfill their family and children's needs better.

Women farmers attempted to identify possible markets and supply chains involving value addition. Initially, they analyzed the prevailing situation. They conducted community mapping exercises analyzing the crop choices and land use, histories of the settlements, each other's roles in agriculture. They used crop calendar to analyse the potential harvesting months. Further in the PAR, they analyzed the potential markets around them, their main suppliers, and possible products that they can produce for marketing. They analyzed each other's capacities for supplying products. They delved deeply into issues through problem tree analysis. They identified the bottlenecks existing in reaching the market avenues.

They identified following major issues which needed to be addressed - inadequate knowledge on food processing and value addition; difficulties

Vikalpani members selling their products at the farmers' market in Monaragala

in getting standard certificates; involvement of intermediaries in marketing; limited information flows of state and other mechanisms; less transportation; and price inflation of raw materials; role of MNCs; less markets for organic products; less finances and equipment; ability in assessing market demand. Then they categorized the issues as those they can find solutions by themselves through collective mechanisms as well as those which needed support from Vikalpani or other institutions They listed the activities that they can initiate and developed collective market proposals. They examined how the initiatives could address the patriarchal market ownership, led by men.

As a result, women farmers initiated Farmers' market, Vikalpani Sales store, Mobile market, Saving groups, Value added food products, 'seed breeding' enterprise and organic input production enterprises.

Women's Collective Initiatives

The Farmers' Market : The farmers' market was one of the successful initiatives of Vikalpani women farmers. They conduct open market, every Friday, in an open space near the public school in Ulugalla grama niladari secretariat. The women farmers of 102 groups initiated the open market with the participation of 25 vendors. Some of the women act as *collectors* and collect the produce (eg. vegetables) from other members and sell in the open market. After selling the collected harvest in the open market, the suppliers are given their share of income. There is a management team in place, which monitors and observes the supply chain and ensures that only non-chemical produce is brought into the market. At the end of each open market event, the leaders team comes together and discusses about how the day went as well as collects new ideas for promoting the open market.

The market was expanded to include other villagers to sell their products. As a result, many women started selling their handicrafts, processed food and other items in the market. The members shared that the incomes went up during those times when villages could not reach out to nearby towns, for example, during times of Covid pandemic and the economic crisis.

Vikalpani sales store: Vikalpani has a small sales store in 102 junctions, operating on a daily basis. The members of the Vikalpani bring their products to this store and sell them to the villagers. Kususm Disanayeka who is the founding member of Vikalpani who took leadership in the PLD discussions on market development, is presently leading the Vikalpani Sales store. She gets an income of around 3000 rupees per day.

Value addition: In the market development discussions, one of the aspects discussed was value-added production process. This was started by women enterpreneurs who took leadership and the raw materials supply was ensured by Vikalpani members.

Seed production: Post PLD discussions, one of the groups developed a proposal on seed breeding enterprise and ventured into seed production. The

government agricultural officers trained women in seed breeding. A collective seed breeding enterprise was started recently, involving 23 woman farmers. Currently, they are in the stage of planting the seeds.

Fig 1: Transformative Elements

Inspiring cases

Sama Kumari, 42 years, is a small-scale producer and a member of Sama Mawatha sub group. Earlier, she used to practice chemical intensive conventional agriculture. She has an upland of 3 acres where she cultivates vegetables such as brinjal, banana, long beans, bitter guard, maize, and chilly. She also has one acre of paddy land. She also cultivates Kawupew, Mun and maize as commercial crops. In 2016, she participated in training programs on agroecology. After gaining knowledge, she transformed her farmland into agroecological farm while successfully influencing her husband too. She participated in Vikalpani open market development, the discussions and decided to bring her products every week and sell in the open market. She collects the harvest of others as well and walks around 1.5 km from her home to reach the open market. She usually earns Rs 2,000 /- a day. She says, *"Turning to engage in agriculture without using chemical fertilizers and pesticides is one of the important decisions that I took in my life. Afterwards, I started to sell the extra harvest in the village market and it helped me to manage my household expenses."*

Sujeewa Rathanayake, 43 years, is a member of Dilena *Tharu* group. She has been engaging in Mushroom production successfully, after participating in PLD discussions. She started the mushroom production at her household. She has a group of 30 women who engage in mushroom production under her supervision.She provides mushroom pots to those women and they engage in the enterprises, collectively. She says, *"The knowledge and the awareness that I got from participating in the programs helped to restart my own enterprise. I share the*

Aruna and Amara, members of Vikalpani, sharing their local experiences with the APEX partners in the regional level workshops

A practical training session on agroecology, learning how to make a nursery while ensuring soil fertility

knowledge with other women in my area on mushroom production.''

Nishanthika, 38 years, is a member of Badalkumbura group. Continuously engaged with Vikalpani from her childhood, Nishanthika, is now a community leader. Based on discussions, she started her own business of processed food production. She gained the knowledge on food processing from the Vidatha Resource Center in Monaragala. Besides, she connected with many government and non-governmental organizations to gain knowledge and resources for adding value to her products. She collects the raw materials for her production from women farmers of Vikalpani directly. Initially, she collected banana, woodapple, papaya and pineapple from the villagers, prepared Jam and sold it in Monaragala town. Gradually, she ventured into dried food production. Now, she produces banana chips, milk toffee and Casava chips. Apart from that she collects Kithul trickle, ragi and other products from the women farmers and sells in the town. She usually earns 200,000 to 300,000 rupees per month. She has her own production unit and there are around 7 women working with her. Presently, she is a consultant for other women in business development.

Conclusion

Vikalpani recognizes that PLD is a sustainable process empowering communities to find their own solutions, collectively. It identifies certain critical elements which have brought about a transformation in their processes (Fig 1). They include Action-Reflection; building economic leadership; putting agroecology into practice; value addition to produce; reaching the end customer directly. The collective experiences and individual cases highlight that women farmers can collectively handle and take control of every aspect of production, marketing and value chain to maximize benefits.

As an organization, Vikalpani has experienced a positive change in the way they work. From mere discussions, they have moved on to using facilitation and participatory tools in bringing about the necessary changes. The facilitation skills required for the process have percolated down. Today, the women leaders of the sub groups conduct their own PARs to identify solutions and initiate action. The women farmers recognize this approach as a supportive and integral tool for their work at ground level.

Vikalpani strongly believes that PLD is a continuous community engaging process. The Action – Reflection - Action process is a useful tool to address any new realities, even in the future too. Currently, Vikalpani is seeking new opportunities to expand the market initiatives to enhance economic leadership of women farmers in their own contexts.

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APEX

PAN ASIA PACIFIC

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