Helping farmers, help themselves

Farmers in a group of four villages in Mulshi Taluka, near Pune, are setting a successful example in working a participatory approach to planning the development of their village. Supported by Japan International Cooperation Agency (JICA) and ICA India, these farmers have initiated a cooperative movement that has bestowed water, milk and money to their village.

Sandeep Khanekar, a 26 year old graduate in Khamboli village in the Mulshi Taluka near Pune metro, has a busy day feeding the cows in his dairy. When he started his dairy just 2 years ago, he had only two buffaloes; now it is home to over twenty five.

Like Sandeep, many of his fellow villagers in the Khamboli village in Mulshi Taluka keep milch cattle at home; and together they have now started the Vithal Rukmini Dairy Society, a cooperative society which collects over 150 litres of milk every day, and sells to bigger dairies in neighbouring Pune.

The money is decent and people are able to make a small profit too. Thus it is not a surprise when Sandeep says that he would rather milk cows in his village than go searching for a job in the city.

Sandeep's example is a refreshing change from the usual instances of young people migrating to the cities, and this has been made possible by the quiet efforts of a non-profit, Institute of Cultural Affairs, India (ICA India) working in Mulshi Taluka's villages for some time now.

Supported by the Japan International Cooperation Agency (JICA), ICA India is implementing a rural development project in Mulshi, wherein it is fostering the formation of Village Cooperatives as the one mentioned above.

ICA India is implementing the project - "*Rural Development for Poverty Reduction*" - which was initiated in 2008, in collaboration with ICA Japan in 4 villages of the Mulshi Taluka in Pune district of Maharashtra - Khamboli, Katarkhadak, Andhale and Jawal.

The aim of this project is to expand cultivable land and its productivity through technology transfers in irrigation and agro-forestry, as also promote economic progress of farmers through dairy development. The project also promotes biogas as an alternative source of fuel among farmer households that have milch cattle; thus integrating dairy development with energy production.

Bringing water to the fields

A picturesque region bounded by the Sahyadris, Mulshi is mostly rocky and hilly in terrain. There is not much availability of ground water here. This was a problem farmers were facing for a long time, as they could not manage to have enough water for farming.

The Government had built two percolation dams in Khamboli and Katarkhadak villages, but the farmers did not seem to have been benefited much, as the farm lands located away in the higher reaches of the villages had difficulty in fetching water from these dams. Farmers mostly had to depend on monsoons for their agriculture, and were able to harvest only one crop in a year.

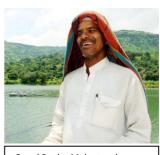
As a result of the low productivity and profits, and the difficult farming, most of the younger generation youth were being pushed away to the cities.

But this year the story has been a little different. In quite a few fields, a second crop has been harvested, and the tide of unprofitability in farming appears to be ebbing. The reason for this new change is the lift irrigation system that has been set up in the Katarkhadak and Khamboli villages under the JICA supported project by ICA. This is bringing waters to the fields of the farmers and is keeping them busy for two seasons in a year.



Lift irrigation site at Khatarkhadak. Photo 1: Submersible motor pumps water; Photo 2: Pipeline system-feeder pipes carry water to the farms; Photo 3: Tanaji testing the water pressure in the pipe.

Gopal Raghu Malpote of Katarkhadak village is one such farmer who has harvested a second crop in the last year. He is a happy man as he explains how the irrigation water is opening up opportunities for him.



Gopal Raghu Malpote, shares his plan for the next crop

"Since the water source is good enough and I can now easily irrigate my fields, I am planning to plant sugarcane crop this season. When water is enough it is profitable to grow sugarcane, as the market rates go up to Rs. 3000 per hectare – so this means less effort and more money."

Like Gopal, there are near 70 other farmers each in Katarkhadak and Khamboli villages who are benefiting from the irrigation scheme implemented by ICA. At the same time, there is also a trickle of young people returning from the city to their village, where income now looks to be better.

Dande Malpote from Khamboli, another irrigation beneficiary indicated an indirect gain from the project. "Having the irrigation system allowed me to plant bajra as a second crop, and I was able to get a yield which was four times more than the previous year. This has generated more income, and has helped me to send my daughter to the junior college, which otherwise would not have been possible," he said.

The lift irrigation scheme is actually a water distribution system to supply water to farmers' fields through a special water pipe set laid by ICA. The water is pumped from the percolation dams with high pressure motors and distributed to the farms through a network of pipes and outlets. The farmers put in their request for water to the irrigation pump operator in advance, and the operator schedules the

distribution accordingly. A fee of Rs. 40 is charged per hour from the farmer beneficiaries; this helps to support the salary for the operator, as also maintain the irrigation set up.

Participatory approach

ICA works with a participatory approach with community stakeholders, whereby it helps them plan for their own development and build replicable model projects for the same.

ICA's Participatory Strategic Planning approach bases on the Technology of Participation (ToP) method, a principle that assumes that the local community has better wisdom and knowledge about themselves. The reflection and reinforcement of this wisdom to understand local realities would lead the community towards collective decision, empowerment and development.

ICA's earlier experiences in applying this method led to the transformation of the communities they worked with. In Mulshi, the success of this participatory approach is already visible in the sense of community ownership of the Katarkhadak irrigation project among the farmers; it was in fact due to their collective effort that the construction of the irrigation system was facilitated by ICA.

The project is thus not just creating infrastructure, it is also building the capacities of farmers to plan and implement what they want for themselves, and bring about community-driven change for good.

The project also provides continuous skill enhancement training on farming and dairying methods to farmers with an aim to promote sustainable agriculture and economic empowerment in the community. Farmers have been able to interact with agri-experts and be trained in new knowledge, like the 4-step paddy method for cultivation of new rice varieties.

Shankar Malpote, a farmer who has attended one such training says, "I have planted seven different varieties of vegetables including chilly, brinjal, tomato, and cucumber, and was able to make Rs.12000 from cucumber in just one season – which is three months. The farming guidance I got from experts helped much in this regard."

Under the dairy development programme, ICA has facilitated the formation of the milk cooperative, which was started in 2009. It comprises members from all the four villages in Mulshi. The JICA project has also funded needy farmers from the village to buy buffaloes, and join

as members of the cooperative.

Every day, the members bring milk to the collection centre in their village, where the milk is tested for its fat content, and its price is fixed accordingly. The milk supplied from the four villages is then taken for sale to dairy centres in Pune. On an average about 150 litres of milk is collected every day. The cooperative also has a refrigeration facility in the



Daily register at the milk collection centre in Katarkhadak

Khamboli dairy.

While the milk produce from the dairy is bringing economic benefits to the farmers, the cattle waste from their dairy is giving energy and manure for domestic use.

Promoting biogas as a safe and expedient source of cooking fuel, ICA is helping farmer households set up biogas plants in their homes. Till date 16 biogas plants have been installed in Mulshi.

The benefits from these alternate sources of energy have been most significant for women, as this has



Usha Bai Khanekar cooks using the biogas generated from cow dung

not only cut down their drudgery in collecting firewood, but has also given them cleaner, smokeless and healthier kitchens to work in.

"Initially I used to go at six in the morning and return at ten, carrying firewood from the hills for my kitchen, but now all that is not needed. I am able to spend more time with my children – help them to go to school on time and also cook faster. I feel better," says Usha Bai Khanekar, a mother of four and a biogas beneficiary.

The initiatives under the JICA programme implemented by ICA have in many ways brought benefits for the people in Mulshi. Apart from developing the infrastructure in the villages here, the project has also nurtured leadership development and participation of individual members here.

Yeshwant Malpote who has been with ICA since the last 12 years affirms this when he says, "Only when an individual is able to develop himself, can he set off a ripple effect of development in his community."

The beneficiaries of the JICA project – the members of the milk and irrigation cooperatives, and the other farmers – attend regular meetings facilitated by ICA, where they discuss issues, plans and proposals for their village development, and come up with solutions through collective decisions.

Such collective engagement has been the driving factor towards the success of both cooperatives and individual members in Mulshi.

In bringing about participatory empowerment of the people in Mulshi, the rural development project of ICA and JICA echoes the adage: *"Give a man a fish, and he will eat for a day. Teach him to fish, and he will eat for a lifetime."*

Summing up the ICA experience, Shankar Jadhav, Executive Director says, "Workers are returning to their village to work in their own farms; biogas is changing the lifestyles of the village people; and the leadership training and technology transfers we facilitate for them, help them to sustain these changes. ICA has come a long way working and participating with the people in their own development, and the JICA support has accelerated this effort for the good."