



# CRS' Response, Recovery and Resilience (R3) program

Cyclones, tornados, drought, cholera and devastating crop disease are among the hazards facing communities that CRS has been helping in Guatemala, Nicaragua, Haiti, India, Bangladesh, Vietnam and Indonesia. In 2013, CRS launched the R3 program to reduce underserved vulnerable communities' risks to multiple natural disasters and build their resilience. A strong dimension of all of these projects was to better understand how people perceive their own resilience. Disaster management and resilience plans developed by communities, households and farmers detailed ways to mitigate and respond to disasters.

# Café Verde (Green Coffee)

This project focused on agricultural extension efforts to help smallholder coffee-farming families to control coffee leaf rust disease. The size of their plots was only a hectare on average and they depended on coffee production for almost 70 percent of their income.

## PROJECT OVERVIEW

The project helped 765 smallholder coffee-farming families, a total of 3,366 people, and began by renovating old coffee plants susceptible to coffee rust—substituting diseased plants for healthy ones.

At the start of the project, communities ranked their risks in terms of greatest impact, prioritizing four. Climate change was rated highest among them. Coffee leaf rust and other shocks that impacted the production and sale of coffee, were also rated as important. Families said measures they took in response to shocks should be incorporated into everyday life so that they became proactive in the face of future disasters.

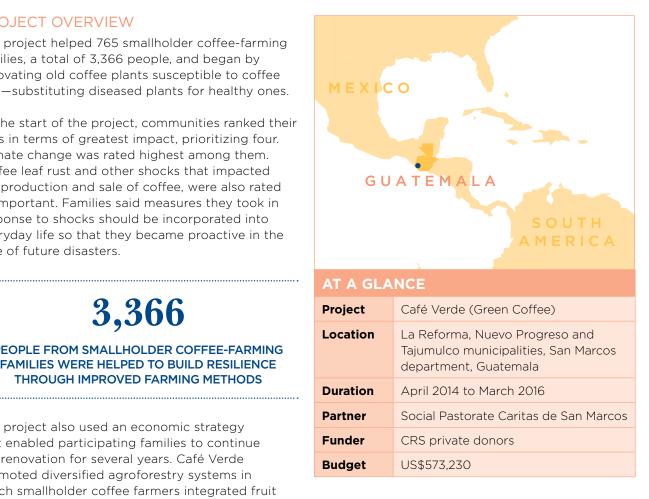
3,366

PEOPLE FROM SMALLHOLDER COFFEE-FARMING FAMILIES WERE HELPED TO BUILD RESILIENCE THROUGH IMPROVED FARMING METHODS

The project also used an economic strategy that enabled participating families to continue the renovation for several years. Café Verde promoted diversified agroforestry systems in which smallholder coffee farmers integrated fruit trees-such as avocado, orange, macadamia and lime—into their coffee plots. These provided shade for the coffee as well as a diversified income for the farmers.

One approach during Café Verde was personalized learning through workshops to guide individuals to find solutions to their specific needs. Savings and Internal Lending Communities, or SILC, enabled coffee producers to save and manage their investments, to renovate their coffee plants infected with coffee leaf rust and to engage in practices to improve the soil.

Farmers said that they were motivated because they had learned that their savings would allow them to invest in improved farming practices and earn more money. During the project, the savings and planting cycles were aligned so that families were able to plant healthy crops using rust-tolerant coffee varieties that would increase



production and income in the short-term so that they could save money from sales and invest in the next production cycle.

The National Coffee Association (Anacafé) provided content for the trainings for farmers, and led them at the municipal level. CRS then adapted the material and facilitated the trainings at the community level. The association became very interested in the SILC methodology and how engaged the farmers were in saving and investing their own resources to increase productivity. Anacafé was particularly impressed by the ability of the project to attract coffee farmers who were not part of coffee producer organizations, as well as by the project participants' high level of enthusiasm and dedication to the practices promoted by the project. Those farmers who had not previously been associated with Anacafé, are now working with the association and thus have access to long-term technical services that CRS will not be able to provide after the project.

#### **RESULTS**

Besides supporting the coffee producers to renovate their coffee plants, the project helped them to form the habit of saving money and provided opportunities for farmers to work to improve their soil so that they could see the benefits for themselves. Café Verde's participatory approach was different from the more common paternalistic approach generally practiced in Guatemala and highlighted the importance of community involvement and rapid adoption of new, improved practices.

Participating farmers received improved crop-, soil- and water-management training in their communities, and technicians also spent time with farmers on their individual plots to further deepen the experiences and uptake of learning. An investment fund enabled farmers to renovate 25 percent of their coffee plots in two cycles. They will be able to renovate the remaining 75 percent over the next 2 years following the same approach. Farmers also saw significant changes resulting from the analysis and adjustment of their soil's acidity levels by applying calcium where needed. Farmers matched CRS' investment to buy and apply calcium to 25 percent of the coffee plots, and they expect that their increased production will enable them to buy all the calcium needed for future crops.

Participants identified the SILC methodology and the establishment of nurseries as the two most important elements of the project. Beneficiaries now save in an organized and systematic way and have a clear purpose for the money saved.

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The establishment of community nurseries gave farmers access to cheaper, more robust plants. *Photo by CRS staff* 

#### UNINTENDED POSITIVE RESULTS

- The investment funds were first considered only for the production of coffee plants but promoters later proposed that these be used to buy calcium and fruit plants to improve production. The farmers embraced this idea and experienced the benefits of their investments.
- Farmers found that they were able to match CRS' investment to buy calcium, something they had not believed they could do prior to the project.
- The bulk purchase of calcium by the municipality of Nuevo Progreso, through a network of SILC representatives, resulted in discounts of 50 percent, with delivery made directly to the community rather than to the municipal capital, as had been done in the past.
- A strong and positive relationship with Anacafé was established through the project and coordination between Anacafé and the coffee farmers is expected to continue well into the future.

#### **LEARNINGS**

- Families that before the project did not believe that they could save money from their earnings recognized that they could save even though they might not have had a high income, and they saw how important it was to save and invest in their production. The project provided accompaniment by trained community members who helped farmers organize and strengthen their SILC groups, and gave financial and marketing guidance.
- SILC groups are a good platform for community organization, discussions among farmers about challenges and solutions, and also facilitate financial management for farm production and other important activities.

- Extension processes with a good strategy, clear plans and intensive supervision result in the adoption of improved practices.
- Families can finance their own crop renovation through revolving-fund strategies managed themselves under strong technical accompaniment.
- Successful projects start by consulting participants about their real needs, their capacities, the risks they face and how to address the gaps in responding to or mitigating against disasters. With this understanding, project strategies can be developed to best meet project participant needs.





Pedro López, president of Friendship and Work SILC, with members of the group. *Photo by CRS staff* 

#### **COMMUNITY VOICES**

Families realized that when they produced high-quality, rust-resistant plants in their own communities, rather than buying plants that had been produced in another community, they were 50 percent cheaper. This also greatly reduced the time and resources required to carry heavy plants from a distant nursery to their own plots, allowing them more time and energy to work on their own production.

Pedro López, 61, lives in Laguna Seca municipality, Nuevo Progreso. In 2012, his entire one-hectare plot was lost to coffee leaf rust.

Today, he is president of the "Friendship and Work" SILC group, made up of 20 heads of families. López said: "To me, both the community nursery and the savings group are important. The nursery helps us improve our coffee production, and savings allow us to save money and invest it later, for example, to buy fertilizer.

This year, López was able to renovate half of his plot by producing rust-tolerant plants of good quality. His dream is to continue working with the group to renovate the other half. "From the moment I started my nursery, I realized that the plants were cheaper and better," he said.

"Families are adopting best farming practices as a result of the training carried out by Anacafé and the Café Verde project. Families are now involved in a renovation process with coffee varieties that are resistant to rust," said one promoter.

#### SUSTAINABILITY

Now that the farmers have proved to themselves that they can save, and that savings allow them to invest and improve production and to meet their needs during the lean season, they will continue to save after the project ends.

Participants recognize that long-term control of coffee leaf rust must continue to include an integrated approach, from genetics to crop management—as has been promoted in the Café Verde project—for optimum results. This includes growing new plants so that regular renovation can be carried out; continually replacing infected plants with rust-resistant varieties and replacing old plants that may be susceptible to disease; soil management; applying good farm system management practices in general; and sound financial management. Crop renovation is preferable to using chemical pesticides, which may quickly reduce the incidence of coffee leaf rust but are expensive and very harmful to the environment.

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The SILC groups will continue to need support, thus a private service provider model was established during the project whereby community members were trained to accompany and provide support to the SILC groups after the project ended, to continue to strengthen their capacities and ensure sustainability.

Connections to Anacafé have opened doors to enable farmers to access post-project technical support and information.



## **CATHOLIC RELIEF SERVICES**

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