

Canada 



# IMPACT STORIES

Community Disaster Risk Reduction Fund



The climate adaptation and Disaster Risk Reduction work being done under the Community Disaster Risk Reduction sub-projects have impacted the lives of thousands of persons. Below we share a few of the stories reflecting those impacts.

## Belize

### Reducing Fire Risks in Southern Belize - Communities Take Charge

*Wendy Betancourt lives in the rural farming community of Bella Vista, Belize – a district where forest fires are a frequent and very present danger. It is also a community that is about 10 miles away from the fire station and so only the resilience of the residents will ensure that their properties and livelihoods are not lost in the event of a fire.*

Faced with this reality, Betancourt and other members of the female Farmers' Club in Bella Vista have been taking measures to ensure they can reduce fire hazard risks.



*The fire risk that the farmers are facing has been exacerbated by climate change with impacts such as longer droughts and increasing temperatures*

“To reduce the destruction caused by frequent forest fires, our homes and farms are constructed with fire proof materials,” she said, explaining that unlike other farming clubs and communities in Belize, many residents of Bella Vista build their houses and farming infrastructure with zinc roofs instead of thatch.

Betancourt, who is the Chairperson of the Bella Vista Farmers’ Club, and the other farmers have also been getting assistance from the Community Disaster Risk Reduction Fund (CDRRF) of the Caribbean Development Bank.



*Fire Chief Grant Perez before his fire truck*

“We recognised that the fire risk that the farmers are facing has been exacerbated by climate change with impacts such as longer droughts and increasing temperatures,” explained Project Manager of the CDRRF, Claudia James. “So we have been working with Humana People to People in Belize to build the capacity of the Farmers’ Clubs and to encourage the implementation of climate smart agricultural practices.”

A key part of this assistance has been a training module in Fire Safety and Prevention that was included in all nine of the Farmers Clubs established under the Humana People to People Project in Belize as well as all 11 target communities under the project. Bella Vista with its population of roughly 6000 people, was seen as a priority community for the training.

“When I heard of the Farmers Club project and the many hazards, I knew it was a good idea to go into these villages and educate these residents on fire safety in the home. Since the trucks and condition of the roads are a problem, the training was considered to be important,” said Independence Village Fire Chief, Mr. Grant Perez, who collaborated with Humana and CDRRF to get the training done.

The Farmers’ Clubs are located in deeply rural areas and the distance a fire truck will have to travel in the event of a fire may mean an entire village could be destroyed before assistance reaches them. To compound the problem, the road conditions leading to these communities present a further challenge for fire units attempting to get into the areas. Limited units are yet another challenge that the fire response entity faces.

“Fire safety is everybody’s business as fire is a deadly disaster so residents were taught that if they decide to burn they must know when to burn so as not to destroy the forest,” explained Perez. Residents use fire to clear their lands for farming and some persons also burn their garbage.

The training covered topics including precautionary measures, specific actions to take in the event of a fire, agricultural practices that include fires and when not to engage in them as well as how to control fires to prevent them spreading.

The training was well received, with members lauding Perez for the practical way in which the information was delivered.

Children were also included in the training and were receptive to the information shared. Many had never seen a fire truck in their village and were quite excited to interact with the chief as well as the unit itself.

By engaging adults and children alike, the CDRRF and Humana hope to equip these villages in Northern and Southern Belize to continue carrying out fire prevention practices. In the event of a fire they will also be equipped with the knowledge to help prevent loss of life and property.

## Clarendon Farmers Diversifying Crop Production to be More Climate Resilient

*Over 300 farmers from nine communities in Clarendon have increased their awareness of climate change and its effects on agriculture. Many are now diversifying their crop production to ensure greater responsiveness to climate impacts and disaster risk.*

This is due to the 'Building Resilience and Adaptation to Climate Change while Reducing Disaster Risk in Peckham, Clarendon and Surrounding Communities' Project which is funded by the Caribbean Development Bank through the Community Disaster Risk Reduction Fund (CDRRF).

"The project aims to build the farmers resilience to the various climate impacts that affect their livelihoods – so that they can transform and adapt using new agricultural practices," said the Project's Manager, Faradaine Forbes-Edwards.).

The project, which is being implemented by the Environmental Health Foundation (EHF) is working with the farmers to increase their climate and disaster resilience. The farmers are from Peckham, Tweedside, Sanguinetti, Grantham, Johns Hall, Morgan's Forest, Silent Hill, Top Alston and Frankfield, communities targeted under the EHF Project.

"We want to ensure that their levels of losses are reduced so when we get long droughts or hurricanes they can cope better than they are coping now," said Forbes-Edwards.

She added that part of that preparation was getting the farmers to use new techniques [climate smart agricultural practices] and advanced technologies to enhance their resilience to climate change impacts. In a bid to do this, the project has had 49 training sessions addressing various agricultural best practices such as post-harvest and marketing strategies, small-scale poultry management, land husbandry, and farm business management.

“The EHF project introduced the Up-lifter (sweet potato) to the target communities. “Before the project they usually planted the Quarter million variety. The Uplifter sweet potato spreads a lot and protects the soil – within 10 weeks of planting it covers all the soil. The tubers are nice and hard and it is the export friendly variety, smooth on the outside and yellow inside,” explained Ruth Simpson, Agricultural Specialist with the Project.

The Up-lifter sweet potato does not take a lot of water to grow and is regarded as a more climate resilient crop. The farmers however have had to contend with pests such as the sweet potato weevil.

“The sweet potato weevil is devastating so we set up a pheromone trap for them. It has worked well here. One trap will work for one acre and lasts for 3 and a half months to 4 months,” said Simpson.

The community, which normally plants ginger, yam, banana, citrus among other crops, has also started using pineapples. According to Simpson, farmers in Maroon Town came up with



*The Uplifter sweet potato spreads a lot and protects the soil – within 10 weeks of planting it covers all the soil*

the Bullhead pineapple – a mix between the Ripley and the Cowboy varieties – which is now being used in the community.

“It gives more suckers and it uses less water. It produces way more suckers than other pines. The average size is about 4-5 pounds. Pineapple is a drought resilient crop and if you plant it right – it’s an excellent soil erosion control measure,” she explained.

The pineapple is also used as a live barrier to help the farmers manage soil erosion in the communities.

“We also established the MD2 pineapple variety to be used as live barriers. It is an emerging variety here as well as the bullhead. The take-up by the farmers is excellent. We did the demo plot initially and have now established 40 replication plots with the farmers. They are also sharing it with their colleagues so it is spreading in the communities,” said Forbes-Edwards, while explaining that the same obtained for the sweet potato varieties.

“We had about 30 replication plots in the communities and these have doubled. The farmers are giving two to three additional farmers slips from their sweet potatoes so it is growing rapidly,” she said.

The project, which runs until December 2019, has also re-established in some cases and strengthened in others nine farmers groups in the target communities. The Farmers Groups are responsible for helping to sustain the climate smart agricultural practices as well as build the farmers capacities to manage their farms.

“The project has been a welcome change to the community. Our yields have increased after the soil tests and the training to help us with how to manage the soil. We are doing things differently and things are looking up,” said one farmer who is a beneficiary of the project.

## Clarendon Farmers Winning the Fight Against Ginger Rot Disease

If you go to communities in the North-Clarendon area such as Top, Alston and Silent Hill, the farmers there are quick to tell you that the area is known for its ginger production and was among the leading producers of the crop from the 1960's until the 1980's when the rhizome rot (of ginger) disease struck.

Since then it has been an on-going battle for the farmers, who are now seeing some light at the end of the tunnel.

"We have been doing a series of interventions including using previously untried lands and treating it [ginger] with topsin in one instance and hot water in the next. We have also been working with the farmers to educate them about the disease and what to do to reduce the spread of the disease," explained Ruth Simpson, Agricultural specialist with the Building Resilience and Adaptation to Climate Change while Reducing Disaster Risk in Peckham, Clarendon and Surrounding Communities Project. The project is funded by the Caribbean Development Bank through the Community Disaster Risk Reduction Fund (CDRRF).

The project, which was launched in February 2018, has been working closely with over 270 farmers in nine communities to increase the resilience of Peckham and surrounding communities in Clarendon to natural hazards and climate change (CC) impacts.

According to the farmers, their ginger yields have been increasing. Many started employing the hot water and the topsin treatment methods and have been procuring clean ginger from successful ginger farmers with the assistance of the Project's Extension Officer, Mr. Andrew Carty.

"We have reaped 400 pounds of ginger so far," said Herbert Freckleton, President of the Top Alston Farmers Group – one of the surrounding communities of Peckham. He explained that many of the farmers were also being assisted by the Rural Agricultural Development Agency (RADA), the Social

Development Commission and the Bodles Agricultural Research Facility.

“We have been working with the farmers to do crop diversification in light of the climate impacts facing the communities,” said Faradaine Forbes-Edwards, Project Manager. “They have challenges with access to water and for most of the farmers, farming has not been lucrative with some of the crops they have been planting and how they have been managing their farms.”



Farmers from Peckham in Clarendon talk about their adjustment to crop diversification in order to be more climate resilient. The farmers (on the right) share their experiences with planting pineapple with Agricultural Specialist, Ruth Simpson (First left) and Cheryl Dixon from the Caribbean Development Bank.

She explained that one of the activities of the project was to do soil assessments in the communities. This helped to determine the pH of the soil and showed that the phosphorous levels were low in that area. The technical team was able to work with the farmers to demonstrate corrective measures and the farmers are thankful for the assistance.

“We have learnt of new ideas such as how to protect our environment with hillside training to reduce soil erosion and also better use of fertiliser,” said Worrell Williams, who plants yams, pumpkins, banana, sweet potato and also rears livestock.

The project which is slated to end in December 2019, will also see the farmers being trained in climate smart agriculture, financial management and marketing strategies as well as good governance and inventory management.

“This group has given hope to small farmers. This group has led me to the business side of farming. I am now thinking of expanding,” said one farmer.

### Jeffrey Town Residents owning Disaster Reduction Programme

When more than 100 residents of Jeffrey Town, St Mary showed up for a recent meeting to discuss strategies aimed at reducing the effects of natural disasters on their communities, project managers experienced a sense of relief.

“It [the attendance] shows how important community engagement is to community development and project sustainability,” said Richardo Aiken, Community Development Specialist.

Chairman of the Jeffrey Town Farmers Association, Wordsworth Gordon, called the increased attendance “encouraging” as he said in the past those types of meetings saw only a small number of participants.

Shawna-Kay Brown-Kennedy, a resident of Jeffrey Town, said she had to be at the meeting as she has a keen interest in community development.

“It [the project] has been good to the youth population of the community, as they were provided with jobs, and training in different areas,” she said

The meeting was held to present findings from a survey designed to obtain the views of the residents on the Jeffrey Town Integrated Disaster Risk Reduction Project (JTIDRRP).



*Gabion basket in Jeffrey Town helps to build resilience against landslides  
A farmer carries water in Jeffrey Town. Under the project implemented there  
residents of several communities have increased access to water.*

The JTIDRRP is a two-year project that commenced in 2015, and is financed by the Community Disaster Risk Reduction Fund (CDRRF) to the tune of just under US\$650,000, and managed by the Caribbean Development Bank.

The project has been examining the effect of climate change on communities within the Jeffrey Town area. It has also

assisted with infrastructural development, food security, income-generating activities, as well as public education and awareness campaigns.

Project Manager of the JTIDRRP, Nellie Richards, is particularly pleased with the water management committees that have been established.

“Residents are already beginning to show ownership, and the level of pride and enthusiasm indicates that they will aid in it being sustained,” she said.

The project also included several training sessions for residents in first aid and fire management.

Richards said the training programme is one of the most successful aspects of the project.

“It’s investment, it’s capacity building, it’s community development, and that will be sustained,” she said.

Resident, Nastassia Williams, was bursting with pride, as she held certificates she received for participating in the training programmes.

“Mi learn a whole heap, and if it comes to the test [cases of emergency], I can teach others and help out in CPR, or putting out a fire,” she said.







**CARIBBEAN DEVELOPMENT BANK**

P.O. Box 408, Wilkey, St. Michael, Barbados  
Tel: (246) 539-1600 • Fax: (246) 426-7269  
[www.caribank.org](http://www.caribank.org) • Email: [info@caribank.org](mailto:info@caribank.org)