



1. Project Data

Project ID
P148809

Project Name
NI Caribbean Coast Food Security Project

Country
Nicaragua

Practice Area(Lead)
Agriculture and Food

L/C/TF Number(s)
TF-18703

Closing Date (Original)
30-Dec-2019

Total Project Cost (USD)
33,830,640.38

Bank Approval Date
20-Feb-2015

Closing Date (Actual)
30-Dec-2019

	IBRD/IDA (USD)	Grants (USD)
Original Commitment	33,900,000.00	33,900,000.00
Revised Commitment	33,830,640.38	33,830,640.38
Actual	33,830,640.38	33,830,640.38



Objective 1: to enhance food security in selected communities of Caribbean Coast of the Recipient;

Objective 2: to enhance nutritional security in selected communities of Caribbean Coast of the Recipient.

According to the internationally recognized definition of food security, it means “access to sufficient food for an active and healthy life”. Nutritional security means access to food that meets dietary needs. The project’s results framework lacked performance indicators to measure progress toward “food security” and/or “nutritional security”. Rather, the results framework focused on the extent to which farmers used improved technologies and increased their productivity. These latter measures were the basis for food and nutritional security indicators for this project funded under the aegis of the Global Agriculture and Food Security Program (GAFSP).

b. Were the project objectives/key associated outcome targets revised during implementation?

No

c. Will a split evaluation be undertaken?

No

d. Components

Component 1: Innovation Development Plans for Strengthening Natural and Non-Natural Resource-Based Productive and Marketing Capacity (Original allocation: US\$31.85 million; Actual: US\$33.49 million). This component aimed to boost the productive and marketing capacities of targeted farmers and rural enterprises by financing the participatory design and implementation (by formal and informal groups) of Innovation Development Plans (IDPs). There were 5 supporting and complementary subcomponents: 1.1: communication campaigns; 1.2: training; 1.3: various types of assessments; 1.4: strengthening organizational and business capacities of targeted producer groups, and fostering smallholder linkages to the market; 1.5: provision of technical assistance for food sanitary and related services. The component also provided financing to cover IDP investments for natural and non-natural resource-based activities. Four types of IDPs were supported: (a) family agriculture; (b) artisanal fisheries; (c) agricultural/agro-industrial ventures; and (d) non-agricultural microenterprises (ICR, para. 15, and Annex 6);

Component 2: Strengthening service provision for sustainable production, food security, and nutrition (Original allocation: US\$6.42 million; Actual: US\$4.84 million). This component financed the strengthening of sector capacity to provide services to IDP beneficiaries in two areas/subcomponents: 2.1: technology generation/validation and transfer to improve productivity and quality of agricultural production by enhancing the institutional capacity of the Nicaraguan Institute of Agricultural Technology (INTA); and 2.2: nutritional education and communication, and nutrition-smart agriculture activities and food handling practices, targeting key subgroups (e.g., pregnant and breastfeeding women and children under five years old) (ICR, para. 16);

Component 3: Project management, monitoring and evaluation (Original allocation: US\$3.73 million; Actual: US\$5.47 million). This component funded project management capacity and project-related activities of the implementing Ministry (MEFCCA), including: 3.1: incremental and operating costs; 3.2: essential equipment and goods; 3.3: comprehensive monitoring and evaluation system; 3.4: environmental and social safeguards, 3.5: financial management and procurement project-related activities.





OBJECTIVE 1

Objective

To enhance food security in selected communities of Caribbean Coast of the Recipient.

Rationale



(1) Number of beneficiaries (or Innovation Development Plan/IDP target beneficiaries) who have adopted an improved agricultural technology promoted by the project: target: 8,000; actual: 10,675; +33%;

(2) Number of female IDP clients who have adopted an improved agricultural technology promoted by the project: target: 1,600; actual: 5,188; +224%;



project was based on the GAFSP proposition that increased food production will improve food security. Based on credible evidence in the ICR that agricultural productivity and food production in the Caribbean Coast area increased substantially due to this project, this review has therefore rated the efficacy with which the project achieved Objective 1 as substantial with moderate shortcomings because of the as yet unverified impact of increased food production on enhancing food security.

Rating
Substantial

OBJECTIVE 2

Objective

To enhance nutritional security in selected communities of Caribbean Coast of the Recipient.

Rationale

Theory of Change: As stated above, the ICR presented one integrated ToC to cover both objectives. The ToC shows how prioritized activities, which were driven by the 4 types of Innovation Development Plans (IDPs), together with improved support services, generated strategic outputs, which in turn, generated the outcomes that contributed to enhanced nutritional security in the targeted communities and for beneficiary farm households. The TOC does not, however, present a precise pathway on how nutritional security (defined in paragraph 26 of the ICR as “having access to food that meets dietary needs”) for the different types of project beneficiary families would be achieved, except through “nutrition sensitive production practices”. The achievement of nutritional security was to be measured by increases in the dietary diversity score (DDS) and the observations that IDPs adopted nutrition sensitive agricultural production practices and nutrition-related training (ICR, para. 37).

Supporting evidence for the achievement of Objective 2 is found in the ICR, paras. 26 -38, Annexes 1, 6 and 8. The following shows the most relevant indicators of improved nutrition in terms of outputs and outcomes:

Outputs

These are the same as for Objective 1

Outcomes

(1) The percentage increase in dietary diversity score (DDS) for women and children of direct beneficiary families: target: 80; actual: 91; +13.7%. Combined technologies leading to increased productivity, diversification and nutrition quality of food produced, together with improved technical assistance which devoted explicit attention to promoting improved nutrition in food production and consumption practices at the household level, contributed to the improved DDS. However, the DDS is only a partial outcome indicator of improved nutritional security, namely “food that meets dietary needs” (ICR, para 26). A comprehensive indicator of nutritional security would also have the same access requirements as food security (namely access to foods with high nutritional value), as well as education on dietary needs.



(2) Percentage of diversified production (involving increased varieties of high nutritional value in crops varieties, Annex 6): target: 15; actual: 45; +200%.

(3) Percentage of volume of farm produce under improved post-harvest management (whereby results were reported by the Bank project team to have promoted enhanced nutrition security at household level): target: 30; actual: 66; +120%;

(4) Percentage of IDPs adopting nutrition sensitive practices: target: 50; actual: 100; +100%; (in terms of selection of crops and food preparation)

Overall there is some indirect evidence of the enabling conditions for “enhanced nutrition security”, even though the extent of the enhancement probably varied considerably between households because of the wide income distribution in the population in the poor coastal project areas. This variability was not assessed in the ICR or in the Impact Evaluation Study. The indicators mentioned above involve relevant aspects of nutrition measures, but their robustness and depth are weak in terms of providing precise measures of “enhanced nutrition security”.

On the basis of the weak evidence in the ICR on whether the project enhanced the dietary needs of beneficiaries, this review concludes that the extent to which Objective 2 (enhanced nutrition security) was achieved is modest.

Rating
Modest

OVERALL EFFICACY

Rationale

Overall Efficacy is rated substantial, but with moderate shortcomings, based on the following factors: Enhanced food security was substantially achieved with moderate shortcomings, and enhanced nutritional security was only modestly achieved, A summary of the justification for these ratings follows.

(a) Enhanced Food Security. This review concluded that the GAFSP assertion that increased production of nutrition-smart crops and products will in turn lead to improvement in “food security” was not tenable since the objective of enhanced food security is based on adequate access to food and not based on increased production of food. Nevertheless, increases in agricultural productivity and corresponding higher food outputs and outcomes were arguably attributable to the activities supported by the project, and over time, they could contribute to enhanced food security. As shown above, most of the targets of the GAFSP performance/outcome indicators for both objectives were exceeded; 13 of the 13 outcome indicators involving both objectives exceeded their end-targets. Nevertheless, based on the ICR’s own definition of food security as “having access to sufficient quantity of food” (para 9), but acknowledging that the core indicator measuring the enhancement of food security by the project was based on the GAFSP proposition that increased production will achieve food security, this review rated the efficacy with which the project achieved





(3) Increased Value of Production, Employment and Returns to Labor: the total value of production generated by the project beneficiaries grew about 3.8 times, family labor increased by 73%, and the average return per day of work increased by 32.5% (ICR, para. 43);

(4) Sensitivity Analysis: The ICR demonstrated a robust sensitivity to changes in farmer adoption rates, drops in percentage of farmers not sustaining their benefits, and decreases in farmgate product prices (e.g., if market prices agricultural products were to drop by 15%, the overall ERR would not decline to below 10%); and

(5) Other efficiency performance measures: The ICR concluded that project design and implementation arrangements were adequate and flexible, and implementation performance was efficient, as reflected in the performance of procurement, staff continuity, no cost overruns, good disbursement performance and no need to extend the project closing date.

Efficiency Rating

Substantial

a. If available, enter the Economic Rate of Return (ERR) and/or Financial Rate of Return (FRR) at appraisal and the re-estimated value at evaluation:

	Rate Available?	Point value (%)	*Coverage/Scope (%)
Appraisal	✓	17.00	95.00 <input type="checkbox"/> Not Applicable
ICR Estimate	✓	22.60	95.00 <input type="checkbox"/> Not Applicable

* Refers to percent of total project cost for which ERR/FRR was calculated.

6. Outcome

Based on the project's "substantial" relevance, "substantial" efficacy with moderate shortcomings and "substantial" efficiency, this review concludes that there were moderate shortcomings in the achievement of its objectives. Therefore, the project's overall outcome is rated **"Moderately Satisfactory"**.

The rationales for the ratings of the three core elements mentioned above are as follows:

(1) **Substantial relevance of the PDO.** This was based on the strong alignment of the PDO (enhanced of food and nutritional security) with the Government's national development and sectoral/thematic policies and strategies, and with the Bank's country partnership strategies (over 2 periods), including the targeting of low income communities and farmers located in the Caribbean Coast areas. As noted in Section 3 of this review, the relevance of objectives was undermined by the lack of an indicator of enhanced food security despite an accurate recognition of its meaning in the ICR, and the weak indicator measuring enhanced nutrition security, while recognizing the expected contribution of increased food production productivity to the project's beneficiaries



(2) **Substantial overall efficacy with moderate shortcomings.** The GAFSP project development indicator for increased food productivity and production, as well as several other performance indicators, were clearly achieved. On the other hand, there was no evidence that increased food production had achieved the expected enhanced food security among the project beneficiaries. The achievement of food security was therefore rated substantial with moderate shortcomings because of the as yet unverified expected impact of increased food production on the enhanced food security of beneficiaries. The achievement of enhanced nutritional security was rated modest because of the weak measures to assess whether enhanced nutrition had been achieved or could be expected to be achieved among the beneficiaries. Hence, this review has rated overall efficacy as substantial with moderate shortcomings.

(3) **Substantial efficiency** This rating was based on the positive estimated economic and financial outcomes for farmers, and the overall efficient implementation performance of the project.

a. Outcome Rating
Moderately Satisfactory

7. Risk to Development Outcome

There is **moderate risk** to sustaining the outcomes and contribution to the project's eventual impacts. The ICR presents a candid assessment of the risks, together with the specific and verifiable mitigation measures, as summarized below (paras. 78 and 79).

(1) Risk of beneficiaries not sustaining their improved production/food and nutrition security practices: The project included design and implementation mitigation measures, to be implemented by a well-established







c. M&E Utilization

The Project's **M&E information was utilized moderately effectively**, based on the evidence presented in the ICR (para. 66), as follows: (i) Project monitoring data, progress and evaluation reports were a "valued input" into management decision-making, and as input for research and various reporting deliverables. However, the ICR recognizes that the data generated by the BL and BMS were not used to adjust the targets of several project indicators. Also, it was recognized only at the end of project implementation/closing (end of 2019), with the completion of IDP execution, that the data regarding the achieved targets became clear;

(ii) The differences between the estimated targets at appraisal and achieved targets at completion revealed that two PDO outcome indicators exceeded significantly their target values because project design used baseline figures which were too high, and did not adjust the target values during implementation: "Baseline study and the Beneficiary Monitoring System/BMS revealed that agricultural/livestock productivity rates reported by IDP beneficiaries were actually much lower than estimated/assumed during project preparation. This information should have prompted a significant increase in the target above 10%." (ICR, para. 66) (e.g., with reference to: "increased agricultural/livestock productivity among all direct beneficiaries", exceeding the target by 680%; and "increased production volume", exceeding the target by 720%).

(iii) M&E activities and outputs provided meaningful inputs for guiding project implementation, including generating progress and evaluation reports which were used to some extent for decision-making by various entities (ICR, para. 66).

M&E Quality Rating

Substantial



(iv) through the implementation of the ESMPs, there were two positive effects: (a) strengthening the institutional capacities for environmental management in the Caribbean Coast; and (b) the technologies were aligned with recommended adaptation/mitigation measures, and climate smart agricultural practices;

(v) the quality & timeliness of the ESMP documents were satisfactory, complying with Bank requirements.

The main actions carried out in compliance with the Bank's Environmental Safeguards which were triggered by the project (covering 5 OPs/BPs) were carried out satisfactorily (para. 69).

The Project triggered the social safeguard policy OP/BP 4.10 Indigenous Peoples. The ICR concluded that the Project compliance with the social safeguard policy triggered was satisfactory. Relevant evidence is summarized in the ICR (para. 70).

The Project developed and implemented a grievance redress mechanism, in consultation with communities, and was implemented effectively (para. 71). A total of 129 incidents were recorded, 81 of which were complaints. The ICR concludes that all complaints were satisfactorily resolved prior to project closing (and report available in project files).





