



GEF

REQUEST FOR CEO ENDORSEMENT/APPROVAL

PROJECT TYPE: Full-sized Project

THE SPECIAL CLIMATE CHANGE FUND (SCCF)¹

Submission Date: 16 January 2012

PART I: PROJECT INFORMATION

Project Title: Promoting a Value Chain Approach to Climate Change in Agriculture			
Country(ies):	Ghana	GEF Project ID: ²	4368
GEF Agency(ies):	IFAD	GEF Agency Project ID:	
Other Executing Partner(s):	Roots and Tubers Improvement and Marketing Programme (IFAD Project), Ministry of Food and Agriculture	Submission Date:	7 Nov 2011
GEF Focal Area (s):	Climate Change (SCCF)	Project Duration (Months)	30
Name of Parent Program (if applicable): For SFM/REDD+ <input type="checkbox"/>	NA	Agency Fee (\$):	260,000 (including PPG fees)

A. FOCAL AREA STRATEGY FRAMEWORK³

Project Components	Expected Outcomes	Expected Outputs	SCCF	Grant Amount (\$)	Co-financing (\$)
CCA - 1	1.2 Reduce vulnerability to climate change in development sector	1.2.1 Vulnerable physical, natural and social assets strengthened in response to climate change	SCCF	712,800	3,533,467
	1.3 Diversified and strengthened livelihoods and sources of income for vulnerable people in targeted areas	1.3.1 Targeted individual and community livelihood strategies strengthened in relation to climate change impacts, including variability		150,200	748,533
CCA - 2	2.1 Increase knowledge and understanding of climate variability and change induced risks at country level and in targeted vulnerable areas	2.1.1. Participatory risk and vulnerability assessments conducted and updated	SCCF	445,400	470,000
	2.3 Strengthened awareness and ownership of adaptation and climate risk reduction process at local level	2.3.1. Targeted population groups participating in adaptation and risk reduction awareness activities		98,900	117,000
CCA - 3	3.1 Successful demonstration, deployment, and	3.1.1 Relevant adaptation technology transferred to targeted groups	SCCF	821,700	3,307,000

¹ This template is for the use of LDCF Adaptation projects only.

² Project ID number will be assigned by GEFSEC.

³ Refer to the Focal Area/LDCF/SCCF Results Framework when filling up the table in item A.

	transfer of relevant adaptation technology in targeted areas				
		Subtotal	SCCF	2,229,000	8,176,000
		Project Management and M&E			
		Project management	SCCF	194,300	359,000
		M&E	SCCF	76,700	450,000
		Total project costs		2,500,000	8,985,000

B. PROJECT FRAMEWORK

Project Objective: Contribute to the reduction of climate-induced risks to the achievement of food security and income generation objectives for the rural communities in Ghana, by focusing on the improvement and adaptation of the cassava value chain in pilot areas of the country.

Project Components	Grant type	Expected Outcomes	Expected Outputs	Trust Fund	Grant Amount (\$)	Confirmed Cofinancing (\$)
1. Awareness raising to climate change and capacity to address impacts along the cassava value chain	TA	<p>1.1 Increased awareness and capacity of small producers, formal/informal organizations of growers, processors, and traders about climate change impacts and adaptation on agricultural value chains and related livelihoods.</p> <p>1.2 Climate meteorological information is made available to inform agricultural investments and planning decisions.</p>	<p>1.1.1 A climate change capacity building programme and awareness raising campaign are designed and tools produced.</p> <p>1.1.2 The capacity of targeted groups to mainstream climate change adaptation into their livelihood systems is built.</p> <p>1.1.3 The awareness of the targeted group is raised on climate change and adaptation needs.</p> <p>1.1.4 Study visits to Congo, Cameroon, Nigeria, and Benin undertaken to promote adaptation benefits arising from the proposed approach and scaling up of the new technologies.</p> <p>1.2.1 Meteorological staff, farmers and processors are empowered in the use of agro-meteorological information for better decision-making for adaptation .</p>	SCCF	544,300	640,000
2. Support adaptation of cassava production to climate change.	INV	<p>2.1 Cassava production is more resilient to climate change impacts and its quality is maintained despite risk of deterioration associated to climate impact.</p> <p>2.2 Risk to cassava production associated with water scarcity mitigated.</p> <p>2.3. Agro-ecosystem resilience to climate change strengthened.</p>	<p>2.1.1 Probability of CC-associated yield losses reduced.</p> <p>2.1.2 Adaptive research on drought-resistant and improved varieties undertaken</p> <p>2.1.3 Higher level of forecasting and prevention of CC-related pests and diseases promoted.</p> <p>2.2.1 Adaptive water harvesting demonstrated and promoted successfully.</p> <p>2.3.1 Adaptive land management practices implemented and successfully contributing to soil and water conservation.</p> <p>2.3.2 Agro-forestry promoted in selected sites.</p>	SCCF	863,000	4,266,000
3 Promote innovative adaptation	INV	3.1. Successful adoption of innovative	3.1.1 Environmental-friendly technologies for energy production and use to	SCCF	821,700	3,270,000

solutions along the agriculture value chain		solutions that contribute to adaptation in the targeted area and sub-sector.	3.1.2 Energy-operated water pumping system installed in the cassava model-processing unit, to supply the necessary water, based on the integrated water resources management approach.			
		3.2. Diversified livelihoods and socio-economic impacts of climate change mitigated	3.2.1 Climate-resilient complementary income sources created for cassava producing and processing communities.			
Subtotal					2,228,300	8,176,000
Project management and M&E						
Project Management				SCCF	194,300	359,000
M&E				SCCF	76,700	450,000
Total project costs					2,500,000	8,985,000

^a List the \$ by project components. The percentage is the share of SCCF and Co-financing respectively to the total amount for component.

^b TA = Technical Assistance; STA = Scientific & Technical Analysis

C. SOURCES OF CONFIRMED CO-FINANCING FOR THE PROJECT (expand the table line items as necessary)

<i>Sources of Co-financing</i>	<i>Name of Co-financier (source)</i>	<i>Type of Co-financing</i>	<i>Co-financing Amount (\$)</i>
GEF Agency	IFAD	Grant and Loan	8,521,000
National Government	Government	In kind	314,000
Other	Beneficiaries	In kind	150,000
Total Co-financing			8,985,000

D. GEF/LDCF/SCCF RESOURCES REQUESTED BY AGENCY, FOCAL AREA AND COUNTRY¹

GEF Agency	Type of Trust Fund	Focal Area	Country Name / Global	(in \$)		
				Grant Amount (a)	Agency Fee (b) ²	Total c=a+b
IFAD	SCCF	CC	Ghana	2,250,000	250,000*	2,500,000
Total Grant Resources				2,250,000	250,000*	2,500,000

*excluding PPG fees

E. CONSULTANTS WORKING FOR TECHNICAL ASSISTANCE COMPONENTS:

Component	Estimated Person Weeks	Grant Amount (\$)	Cofinancing (\$)	Project Total (\$)
Local consultants*	350	426,300	520,000	946,300
International consultants*	100	223,700	310,000	533,700
Total	450	650,000	830,000	1,480,000

F. PROJECT MANAGEMENT COST

Cost Items	Total Estimated Person months	Grant Amount (\$)	Co-financing (\$)	Project Total (\$)
Project officer	30	80,800	0	80,800
Secretary	30	11,800	0	11,800
Driver	30	6,700	0	6,700
Office facilities, equipment and vehicles	NA	74,700	299,000	373,700
Workshops	NA	5,200	25,000	30,200
Travel	NA	15,100	35,000	50,100
Total		194,300	359,000	553,300

* Includes some technical studies

G. DOES THE PROJECT INCLUDE A "NON-GRANT" INSTRUMENT? NA

(If non-grant instruments are used, provide in Annex E an indicative calendar of expected reflows to your Agency and to the GEF/LDCF/SCCF Trust Fund).

H. DESCRIBE THE BUDGETED M & E PLAN:

1. The operations of the M&E systems will be designed and implemented by using the suitable components from IFAD's Manual on Results Monitoring and a list of acceptable indicators. In line with the GEF/SCCF operational principles, the IFAD/SCCF M&E activities will be country driven and provide for consultation and participation. The M&E function will be integrated in the overall M&E system of the baseline MOFA/RTIMP operations.
2. Members of staff of the executing ministries and co-operating ministries and institutions are expected to support evaluations by responding promptly and fully to requests for information relating to the activities of this project and for sharing relevant experiences. The GEF and UNFCCC Focal Points will have a particular responsibility for the use of, follow-up to and action on project evaluation recommendations.
3. The IFAD/SCCF project M&E system will be made particularly effective as it will include participatory elements, ensuring that local communities and partners are involved in the process. Local institutions including Farmer Based Organizations will be fully consulted with, informed and briefed about the plans, implementation and the results of M&E activities. The participatory approaches to M&E are highlighted at all levels, concerning in particular, investments directly benefitting beneficiaries. A part of the M&E will be devoted to women's focus groups.
4. The M&E system will optimize prospects for sustainability following the eventual termination of the IFAD/SCCF interventions, by using indicators that are straightforward to collect and/or have been identified as critical to track.
5. The specific tools, methods and indicators for measuring the project impacts will be further defined during the inception workshop. A detailed plan will be prepared each year in order to identify the activities that must be implemented during the following 12 months. Each report will be sent to IFAD with copies to national counterparts so that it may propose revisions and recommendations they deem necessary.
6. Inputs, process, outputs, and outcomes indicators for each component are defined to ensure adequate monitoring. Where possible, all indicators should be measured annually, although cost constraints and availability of data will limit the frequency possible for some indicators.

7. Summary of monitoring and evaluation, and responsible entities:

Table 1: M&E Responsibilities

Type of M&E activity	Responsible entities	Timetable
Baseline Survey	NCPU M&E Officer Procurement Officer	Within the two months following project start-up
Impact Studies	NCPU M&E Officer Consultant	Within the two months following project start-up
Start-up Workshop	NCPU M&E Officer	In the middle and at the end of the project
Mid-term Review/External Evaluation	NCPU M&E Officer Consultants	Half-way into project implementation
Final External Evaluation/Terminal Reports	IFAD GEF Consultants	At the end of the project
Yearly Progress Reports	NCPU M&E Officer	Annual
Dissemination of Project Information	NCPU M&E Officer IFAD	Bi-annual
External Audits	NCPU IFAD	Annual

8. The results of the M&E system will also contribute to strengthening overall knowledge on climate change adaptation. More specifically, it will contribute to enriching the knowledge base by drawing on lessons learned from the cost-effectiveness of the models of adaptation activities as well as the need to best use and extend these activities to the entire country.

PART II: PROJECT JUSTIFICATION

A. DESCRIPTION OF THE CONSISTENCY OF THE PROJECT WITH:

A.1.1. The GEF focal area/LDCF/SCCF strategies:

a.1.2. For projects funded from LDCF/SCCF: the ldcf/sccf eligibility criteria and priorities:

9. In line with the SCCF criteria for project proposal, the IFAD-supported project was developed in compliance with the principles of country ownership and drivenness. The project team engaged in extensive consultations with the Government to ensure that these principles were fully taken into account. Also, the activities supported through the project have been identified as priorities in the Ghana's National Climate Change Adaptation Strategy (NCCAS). In view of the above, the proposal fully addresses the national priorities in its field. Furthermore, GEF and SCCF criteria for project design and financing have been respected. Project management costs represent less than 10% of the total SCCF budget requested and co-financing ratio fulfils SCCF criteria. Finally, the project was developed in coordination with other ongoing activities, namely RTIMP and REP.

A.2. National strategies and plans or reports and assessments under relevant conventions, if applicable, (i.e. NAPAS, NAPs, NBSAPs, national communications, TNAs, NIPs, PRSPs, NPFE, etc.):

10. The Government of Ghana, with the support of a wide range of partners, is engaged in a wide range of programmes and agricultural development projects. However, the agriculture sector, both at the national and the local food security level, is highly vulnerable to climate change. Climate change is acting as a "multiplier" of existing threats to sustainable development. National development and progress towards food security could be stalled unless the adaptation measures outlined in the Ghana's NCCAS and addressed in this proposal are implemented.
11. The SCCF project contributes to the GPRS II objective to encourage farmers to shift from subsistence agriculture to more-oriented production using simple but relatively more advanced technologies in processing. The use of new technologies for high quality and more diversified cassava processing and food production will represent a major contribution to climate change adaptation, responding to multiple measures and recommendations proposed by the NCCAS and by the SNEP and bio-energy policy.
12. The SCCF funding will complement the government and community level capacity building and field level agricultural development activities of RTIMP and REP. While RTIMP currently works on improving and increasing R&T crop production and upgrading R&T processing and marketing, it does not specifically address the adaptation needs that cassava value chain actors will need to incorporate in their work to cope with climate change impacts. The SCCF project will support RTIMP to develop, test and disseminate adaptive land and water management practices, to incorporate climate change adaptation criteria in the selection of crop varieties and cropping systems, and to set up effective early warning systems for better agricultural and enterprise planning and decision making. The SCCF project will also incorporate climate change data and modeling in the RTIMP daily work.

B. PROJECT OVERVIEW:

B.1. Describe the baseline project and the problem that it seeks to address:

13. Root and tuber crops are the most important agriculture produce in Ghana, contributing 40% of the country's AGDP, with cassava accounting for 22% of the AGDP. Cassava supplies a major source of daily carbohydrate intake to the majority of Ghanaians and it also has an important role as a food security crop, due to its ability to grow on poor quality land and its tolerance to drought. With an estimated per capita consumption of 151.4 kg/year, cassava alone accounts for 34% of food crop consumption in Ghana.
14. Roots and tubers (R&T) are most likely to be significantly impacted by climate change, with an expected reduction of cassava productivity or yields of 3%, 13.5% and 53% in 2020, 2050 and 2080 respectively. Because of the crucial role that cassava plays in food security and the rural economy of Ghana and the serious threat posed by climate change to this crop system, it is very urgent to incorporate adaptation measures in the future development of this agriculture sector.
15. IFAD is supporting the Government of Ghana through the RTIMP programme to enhance the food security and income of poor rural households in Ghana, with special emphasis on women and other vulnerable groups, such as youth, whose economic activity is mainly based on R&T production, processing and marketing.

16. The main purpose of the RTIMP programme is to build a competitive and market-based Root and Tuber Commodity Chain (RTCC) supported by relevant, effective and sustainable services that are available to the rural poor. RTIMP is implemented through 3 components along the value chain: A) support to increased commodity chain linkages; B) support to root and tuber crop production; C) upgrading of root and tuber processing and marketing. The Programme has focused largely on establishing and consolidating the services on which the rural poor rely to ensure effective participation in the value chain through the improvement of R&T production. These include: availability and access to improved planting material; mass-production and release of biological agents to control pests of root and tuber crops; capacity to facilitate *Farmer Field Fora* to test and adopt sustainable land management and production techniques. The programme also addresses the identification and promotion of more efficient processing technologies, the establishment of Good Practices Centres (GPCs) with business development & marketing skills, and facilitation of access to the Micro-enterprise Fund (MEF) for retooling. Commodity chain linkages are developed to connect small producers and processors to larger scale processors and to markets in the operational zones. The IFA's supported Rural Enterprises Programme (REP) complements and strengthens RTIMP to provide complementary services that will upscale the achievement of viable and competitive micro-rural enterprises linked to the cassava marketing sector.
17. The IFAD/SCCF project will work in 3 agro-ecological zones (Inner savannah, Transition Forest-Savannah, and Semi-deciduous Forest), 4 regions, and 7 districts of the country where the co-financing partner MOFA/RTIMP operates. The selection was based on a number of criteria, including environmental and social vulnerability, cassava agricultural potential, geographical spread, RTIMP presence, and avoidance of overlap with other donor operations.
18. Under RTIMP, development activities are carried-out without considering the additional costs incurred due to the impacts of climate change. In particular, the RTIMP programme does not seem to consider that the productivity of cassava and other crop yields are expected to decrease because of environmental disruptions caused by climate change and variability, and that the current environmental problems related to cassava production and processing will be exacerbated by climate change. This implies the need to expand the scope of the activities under RTIMP, which otherwise might end up being insufficient on the long term. Moreover, climate change calls for a better understanding of the phenomenon and its impact by all stakeholders, if timely and appropriate adaptation measures are to be taken.
19. The SCCF project will adopt the same value chain approach of RTIMP and will address climate change adaptation needs and options along the value chain linkages –land and water management, crop production, processing and marketing- to increase resilience to climate change. The project will become a platform for the value chain actors (researchers, farmers, processors, traders, fabricators, transporters, bankers, governmental staff, educators, health staff, NGOs and media staff) to jointly understand the cassava value chain vulnerability to climate change impacts and implement effective adaptation measures.

B.2. incremental /Additional cost reasoning: describe the incremental (GEF Trust Fund) or additional (LDCF/SCCF) activities requested for GEF/LDCF/SCCF financing and the associated global environmental benefits (GEF Trust Fund) or associated adaptation benefits (LDCF/SCCF) to be delivered by the project:

20. Most of the business as usual rural development interventions, despite recognizing climate change as a possible risk to the achievement of development objectives, are built without considering the potential severe climatic shocks that will affect the performance of the supported activities. The Government of Ghana is currently implementing with the support of IFAD the Roots and Tubers Improvement and Marketing Programme (RTIMP) that will serve as baseline and co-financing for the SCCF adaptation intervention. While RTIMP currently works on improving and increasing R&T crop production and upgrading R&T processing and marketing, it does not specifically address the adaptation needs that cassava value chain actors will need to incorporate in their work to cope with climate change impacts.
21. The Rural Enterprises Programme (REP) effort to upgrade the technical and entrepreneurial skills of rural micro and small enterprises indirectly addresses and promotes rural income diversification, which is a very

relevant option for climate change adaptation. Nevertheless, REP does not consider adaptation needs to address the risk of farm-level income loss associated with climate-related risk.

22. The rationale for additionality is explained by the fact that baseline activities do not tackle directly climate change impacts on agricultural production. In a business as usual scenario, the main goal of agricultural-related intervention aim to increase productivity and achieve food security and development objectives without considering that their achievement may be limited or hampered by the effects of climate change. The IFAD/SCCF intervention will aim to ensure that these objectives are achieved even in presence of increased climatic stressors that are critical to sustain agricultural production. The SCCF project will support RTIMP to develop, test and disseminate adaptive land and water management practices, to incorporate climate change adaptation criteria in the selection of crop varieties and cropping systems, and to set up effective early warning systems for better agricultural and enterprise planning and decision making. The SCCF project will also incorporate climate change data and modeling in the RTIMP daily work (i.e. information system to support farmers decision-making and planning; applied research; awareness raising and education; etc).
23. The additional value brought by SCCF to REP will build the capacity of the Business Advisory Centres (BACs) to facilitate ways for Micro/Small Enterprises (MSEs) to understand how climate change will affect their businesses, especially in the agricultural sector, assess climate-related risks and opportunities in business development, and build adaptation strategies to allow vulnerable entrepreneurial households to keep a competitive edge by accounting for emerging climate risks in decision-making. Moreover, the project will support technological innovation for adaptation in the agro-business operations through pilot interventions, and will transfer know-how to the Rural Technology Facilities (RTFs) for their promotion and dissemination. The SCCF intervention will cover the additional costs that are relevant to these activities, and benefiting the same target groups along the cassava value chain. Building on the specific contribution of the RTIMP and REP and detailing the SCCF additional reasoning will be a prerequisite for the approval of the final project design.
24. The seven project districts (Gonja, Kintampo, Krachi, Nkoranza, Offinso North, Techiman, Wenchi) are an area where the SCCF project can successfully intervene using multiple approaches to help cassava producers and processors adapt to the impacts of climate change, making their cassava farming systems more resilient to the various current and predicted future impacts of changing rainfall patterns and rising temperatures. Key entry points will be the adaptation technologies for SLWM and for the high quality processing of a wider range of food products. The project will also encourage farmers to maintain a diversity of crops on their land. This criterion is widely accepted as a key adaptation to food security, as it reduces the impact of a crop's failure under climate change impact.
25. Agricultural productivity and the conservation of natural resources (particularly forests and tree crop areas) will be improved, allowing climate-proofed food security, which will lead to improved economic and social stability.
26. Awareness raising and action research will help land users to plan, test and validate alternative crop varieties to increase yields under a climate change scenario, and adaptive land and water management practices to cope with changes in climate and enhance the agro-ecosystem's diversification and resilience. The project will raise awareness and capacity among local land users on climate change impacts and adaptation through co-learning.
27. SCCF is also seeking aiming to improve smallholders' access to innovative technologies supporting high quality and more diversified production opportunities, and facilitating access to exiting and new markets. Within Component 3 of the project, a considerable amount of facilities will be set up – namely two bio-energy plants, a new building with processing machinery, two cooling chambers and a honey processing room- to run a new processing centre that should become operational soon after project start-up. This considerable investment should be regarded as key pilot initiative, which could be eventually replicated elsewhere in the country and the region. The successful completion of this part of the project will require significant input and support in terms of CB, the enduring commitment of decision makers and administrations at all levels, and the contribution of highly-qualified national and of international consultants.

28. As the IFAD/SCCF project will be a blended project, fully integrated into the IFAD-supported RTIMP and co-financed by IFAD, it will benefit from the synergies generated by sharing resources and structures. This partnership will undoubtedly boost the cost-effectiveness of both interventions, notably because of the joint management structure and M&E framework. Other expected benefits are the improved coordination and communication, the application of common procurement and supervision procedures (reducing costs), and the implementation of complementary project interventions in the seven project districts. Furthermore, lessons learnt through the work of RTIMP have, and will be constantly integrated in the course of project implementation.
29. The proposed IFAD/SCCF operation focuses on investment and impact on the ground. Because of this, the project has been carefully designed to attain an optimum level of investment that ensures cost-effectiveness and maximum impact per SCCF dollar. The project will particularly focus on targeted capacity building and on improving the necessary technologies (i.e. adaptive management techniques for sustainable land and water management; innovative technologies for sustainable energy uses and improved food processing, in terms of quality and diversified products) to better streamline the adaptation investment. Project design is based on a number of technical and financial feasibility studies, which were carried out by experts during the project formulation phase based on existing, similar work in Nigeria and Ghana, in the framework of the Regional Cassava Processing and Marketing Initiative (RCPMI). The primary and secondary data for the feasibility studies were collected during field visits in 2011. The outcomes of these studies provide a solid justification to the project approach, compared to alternative approaches (see annex 10 “Financial feasibility studies in SCCF Full Project Document).
30. The successful track record of RTIMP in developing partnerships with a wide range of stakeholders and creating effective organizational mechanisms for local groups is a significant added value that will be made available to the new project. The project will use proven mechanisms for community participation, such as farmer field fora, district stakeholder fora and exposure visits, as well as other capacity building tools and actions (i.e. training trainers from all concerned stakeholders at the regional and district levels), and government’s involvement and technology transfer - particularly regarding SLWM and sustainable energies. Also, the broad consultations with different stakeholders during project design helped raise awareness about the new initiative, and allowed the team to collect views in terms of technical and institutional issues.
31. SCCF funding for Ghana is designed to be catalytic for scaling-up adaptation to climate change. The input of SCCF funding will translate into: (i) more sustainable land and water resources management through conservation agriculture techniques; (ii) improved water resource management in agriculture and drinking water; (iii) improved access to weather and climate information; (iv) improved food processing techniques based on sustainable energy sources – thanks to the positive impact of targeted technical and institutional capacity development, and the implementation of on-the ground activities (including demonstrations). The project will work with existing community structures such as the Good Practices Centres (GPCs) established by RTIMP, and will aim at strengthening them, so as to magnify their impact and further empower them in the marketing and high quality processing of their products.
32. In addition to the adaptation benefits required under the SCCF, the project will contribute a number of other environmental co-benefits at the local to global levels. Notably, any improvement in agriculture land management and sustainable agro-forestry management for wood-fuel production will protect above and below ground carbon stores, contributing to climate change mitigation. The use of waste as bio-energy in addition to a more efficient use of wood-fuel will significantly reduce deforestation and CO2 emissions to the atmosphere, thus contributing to climate change mitigation and to the reduction of soil and water pollution at local level. This will furthermore protect biodiversity in agro-forestry ecosystems, and reduce the risk of desertification. The project will also raise awareness on the win-win benefits between environmental benefits and socio-economic development among land users.
33. The following table summarizes the climate change impacts, adaptation benefits and complementary mitigation effects corresponding to each project component:

Table 2. Climate change impacts to the cassava value chain, adaptation measures proposed by the SCCF project and their mitigation potential

Cassava Value Chain	Current scenario	Climate change impacts	CC Adaptation measures	Additional CC Mitigation Effects
Cassava Production	<ul style="list-style-type: none"> - Low cassava yields (17 T/ha average). - Low soil fertility. - Soil erosion. - Significant pests/diseases and weed infestation problems. - Scarce/low accessible water resources. - Slash and burn deforestation, erosion and nutrient deficiency problems. - Tenure problems mainly for women. - Unreliable production patterns and levels. - Production losses due to storage and post-harvest problems. 	<ul style="list-style-type: none"> - Yield reduction due to lower water availability and higher erosion risk. - Higher risks of pests /diseases and weeds. - Higher risk of intense and frequent fires from deforestation and bad agriculture practices. - Higher cyanide contents in raw cassava. - Higher unreliable production patterns and levels. - Lower revenues and capacity to access/rent farm land. - Increased storage and post-harvest problems due to higher temperatures. 	<ul style="list-style-type: none"> - Development, access and wider use of nutrient efficient, drought-tolerant, high-yielding, disease-resisting, early maturing crop varieties. - Adoption of SLM techniques that increase soil fertility, water retention and crop production/ha (targeting up to more than 20 t/ha). - Efficient use of scarce water resources and higher availability in dry periods (i.e. during harvesting season). - Farmers enabled to predict CC impacts and plan/decide best options to cope with changes. 	<ul style="list-style-type: none"> - Soil carbon storage in agriculture land. - Reduction of emissions from prevented burning of agriculture and forestland.
Cassava Processing	<ul style="list-style-type: none"> - High soil and water pollution problems from cassava waste peels and wastewater. - Accidental and provoked fires in waste disposals. - Health problems from pollution and inappropriate processing techniques. - Water scarcity for processing contributing to low quality derivatives and sanitary problems. - Inadequate processing technologies resulting in low quality cassava derivatives. - Low revenues and savings to invest in adequate processing technologies and complementary agriculture/off farm activities. 	<ul style="list-style-type: none"> - Increased surface/ underground water pollution from cassava waste due to higher temperatures and water scarcity. - Higher risk of accidental fire linked to waste disposals of cassava processing. - Higher risk of cyanide content in cassava processed products and related health problems. - Lower availability of wood-fuel to process cassava due to fire-related impacts and growth reduction CC-effects on forests. - Lower production rates and products with less quality. - Lower workforce due to migration. 	<ul style="list-style-type: none"> - Use of sustainable energy production technologies that reduce environmental stressors exacerbated by CC (effective use of waste as bio-energy to prevent soil and water pollution and health problems; significant reduction and efficient use of wood-fuel to prevent deforestation and CO2 emissions). - Improved post-harvesting technologies that increase quality and diversify products. - Increase revenues from a wider range of products, and the capacity of savings to investment in new opportunities and obtaining bank loans. 	<ul style="list-style-type: none"> - Significant reduction of deforestation and forest degradation (REED) due to lower dependence on wood-fuel and - Reduction of CO2 emissions due to efficient energy uses of wood-fuel and waste biomass.
Cassava Marketing	<ul style="list-style-type: none"> - Difficult access to markets. - Scarce capacity to negotiate prices. - Scarce capacity to invest in complementary products to open new markets. 	<ul style="list-style-type: none"> - Less accessibility to markets due to CC impacts in infrastructures. - Higher unsecured markets due to highly variable and less predictable production linked to CC and climate variability. - Lower capacity to negotiate prices due to lower production of less quality products. 	<ul style="list-style-type: none"> - Higher and new market opportunities for a wide range of products. - Higher capacity to negotiate prices due to high quality products and less perishable products. - Improved organization and governance of food producers with higher marketing knowledge and capacities. 	

		- Minimised capacity to invest in complementary products/markets.		
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B.3. Describe the socioeconomic benefits to be delivered by the Project at the national and local levels, including consideration of gender dimensions, and how these will support the achievement of global environment benefits (GEF Trust Fund) or adaptation benefits (LDCF/SCCF). As a background information, read Mainstreaming Gender at the GEF.:

34. Smallholders will be the target of the awareness raising and capacity building programme, as well as the main beneficiaries of the components on production/processing improvement and the provision of new technologies. This means that this category of stakeholders will be at the centre of all the actions foreseen along the value chain.
35. The most vulnerable groups -women and youths- will be the primary beneficiaries of SCCF project, as they are the main workforce in the cassava-processing sector and will face higher difficulties in coping with climate change impacts. The enabling land management, economic, good governance, decentralization, equity and gender-balanced strategy being developed by RTIMP and other programmes and projects like REP, offers favourable working conditions for adopting a climate-proofed agriculture framework to reduce rural poverty in the long-term.
36. The SCCF project will focus on asset-poor, food-insecure and labour deficient cassava farm households individual/groups of women and youth (mainly involved in cassava processing activities) and men farmers (mainly involved in cassava production activities, processing and marketing) living in fairly remote rural areas. These target beneficiaries are most prone to food insecurity because of the difficult access to markets.
37. SCCF will enable the put in place and testing of a high-impact pilot project, which can entail clear benefits to the local private sector and thus increase its buy in. Another added value of SCCF will be the facilitation of linkages between the bank sector and the small enterprises, which should translate into increased financial resources available to rural entrepreneurs.
38. The financial and institutional strategy, reflected in project, will encourage local initiative to address adaptation targeting the most vulnerable groups and households. The project will enable them to have better understanding of adaptation and to integrate project activities in a sustainable and culturally-sensitive manner that is driven by interest and benefits from the proposed activities. The project will also contribute to capacity building for government institutions to help them gaining experience and competencies in a gradual fashion to increasing deal with climate change adaptation in a sustainable and systematic manner even after SCCF project closure.
39. The lessons learned and good practices developed by the SCCF project will help guide the implementation of the National Water Policy, by demonstrating effective groundwater and rainwater harvesting techniques that may eventually be incorporated into the building code and enforced by the government. In a similar way, the project will contribute to the implementation of the Strategic National Energy Plan (SNEP 2006-2020) and the Bio-energy Policy of Ghana. The pilot model cassava processing centre based on the use of sustainable energy produced from agriculture/forestry waste will help accelerate the development and utilization of renewable energy and energy efficiency technologies in remote rural areas in Ghana, and it will favour private sector participation in energy infrastructure development and service delivery.
40. The use of new technologies for a more efficient and healthy use of wood-fuel and the production of energy from cassava waste products (peels and wastewater) in the pilot model processing centre will not only improve working conditions for poor women and youth population but will also help diversify production (i.e. a wider range of cassava products and other food products like mushrooms) and increase the quality of product and the potential for food preservation, which in turn will open better and new market opportunities. This may encourage longer-term and more equitable commercial agreements between processor groups and traders.

41. The project will also encourage and assist local community groups to develop and introduce improved technologies and higher levels of efficiency in the production and consumption of wood-fuels.

B.4 Indicate risks, including climate change risks that might prevent the project objectives from being achieved, and if possible, propose measures that address these risks to be further developed during the project design:

42. One challenge is the limited capacity of both professionals at the national level and community level to understand and assess climate change impact. For this reason, capacity building and training will be a key success factor and will be promoted to overcome this risk. Isolation and remoteness of people in the rural areas is an additional constraint, which could impede the full involvement of the local communities in the project activities. However, the blended nature of the project, benefiting of the activities undertaken in the RTIMP with its good outreach, should reduce this risk and ensure adequate participation rate. This should be also ensured by the strong participatory philosophy of the baseline activities.
43. Project design has taken into account the strong commitment by the GoG at the national level, and by the local stakeholders, to undertake adaptation measures and implement the NCCAS priorities through concrete investments. The implementation of the project will be undertaken through community-based approaches that address local cultural, socioeconomic and ecological concerns. In this regard the project will be implemented as an integral component of the RTIMP to which authorities have also demonstrated their full commitment to implementing its components in effective manner.
44. The project will significantly depend on the strength and commitment of local stakeholders at the village and community level that are identified as the key participants. The project will ensure that these individuals and organizations are mobilized and empowered with sufficient commitment, finances, jurisdictions, and backstopping to enable them to provide the leadership, guidance, and entrepreneurship necessary to implement and manage the planned initiatives within the project.
45. Risks assumptions and suggested mitigation measures are reflected in the table below.

Table 3. Risks assessment and potential mitigation measures

Risks	Risk rating*	Risk mitigation measures
On-ground implementation slowed by bureaucratic constraints	M	Use of the project participatory approach associated with sufficient institutional strengthening provided under the project and the RTIMP will allow adequate remedial measures to this risk
Decentralization policies not effective	M	Sufficient institutional strengthening of DAs, and policy statement on roles and responsibilities of local authorities and communities as well as technical backstopping to securing communities engagement is targeted through many project activities and is a major component of the baseline RTIMP and REP.
Insufficient staffing for backstopping	M	In addition to the line ministries departments and services, the project will involve national and regional institutions and local service providers for backstopping. Furthermore, RTIMP and REP are investing in capacity building and technical backstopping and this will provide further support to local government institutions and services, research/academic institutions, NGO and communities in particular). The SCCF funding will empower all them for dealing with climate change adaptation.
Inadequate staffing for backstopping	L	The project will put efforts into a comprehensive training/awareness raising program for technical staff that will be responsible for project implementation, to ensure that the project strategy and its objectives are fully integrated by the local project implementers.
Institutional memory loss	M	The project will ensure all project activities and achievements are well documented (soft and hard copies of all documents will be kept). Information on the project will be made available to research,

		<p>university, and school teachers – who will be encouraged to include this in formal and/or extra-curricular activities (e.g. eco-clubs). Furthermore, record of the project’s achievements will be publicised at national / international meetings and on websites.</p>
<p>Land tenure issues impact on implementation of project activities and sustainability of achievements, with special attention to gender issues.</p>	M	<p>The Project will pay a particular attention to land tenure security and issues in the vulnerability mapping efforts as well as in the design and the implementation of the management/adaptation plans. The awareness raising efforts will also focus on land tenure as a key factor for adaptation to climate change. The land tenure issue that may be connected with the establishment of new cassava processing plant and bio-energy plants will be handled by the government, namely by the District Assembly of Techiman Municipality.</p> <p>Sensitization workshops have been held (and will held) to ensure the participations of all concerned partners.</p>
<p>Insufficient application of targeting procedures</p>	L	<p>Targeting will be aligned with IFAD’s targeting policy and the targeting approach of the RTIMP. Effective monitoring and evaluation procedures will be established to ensure that targeting is adequate.</p>
<p>Capacity of local service providers and implementation partners to provide high quality services in relation to the implementation of the specific outcomes of the SCCF and climate change adaptation activities.</p>	M	<p>The selection of service providers will be subject to rigorous selection processes. The project will establish clear criteria to ensure that the best service providers and partners are engaged. The project also entails adequate allocations for TA (local and International) to ensure that the specific technical adaptation aspects benefit from further technical support to minimize risk and consolidate project interventions. Also IFAD will be involved in identifying the service providers to ensure that all specific technical criteria are met for each activity.</p> <p>The project will establish performance-based contracts with sub-contractees on a yearly basis in order to monitor compliance with the project work plan.</p>
<p>The lack of access to financial services and poor functioning of the markets related to low and medium value food crops discourages innovation and technological improvement.</p>	M	<p>Increased availability of MEF is being experienced in the project area thanks to the removal of some of the main bottlenecks hampering access to funds. The subsequent improvement in the quality and safety of the products is increasing market opportunities thanks to boost of exports.</p> <p>Ecobank-Ghana is interested to support the multiplication of the project’s achievements and results.</p>
<p>Weak political will to streamline and consolidate the institutional framework and enforce laws.</p>	M	<p>The Government of Ghana is showing commitment to improve the situation. MEST set up National Committee on Climate Change to review/improve existing policies and programmes. Environmental, agricultural and other sectoral policies and strategies increasingly reflect sustainable management concerns. The Government has initiated a new land policy and a land administration project that seeks to address land issues comprehensively.</p>
<p>Governance issues, including “Elite capture” with the “plausible recurrent risk” of deviation and capture of the benefits accrued from the project by the “better off”.</p>	L	<p>One of RTIMP’s achievements is the increased capacity obtained by upgrading micro/small processing enterprises into GPCs. Thanks to this, the GPCs are now serving as key hubs around which several farmers sell their cassava roots as well as small processors utilizing the facilities in the communities, with subsequent boosting of economic activities and wealth creation in the poor rural areas. Such benefits have a multiplying effect and facilitate the increase in number of MSE upgraded and ready to become GPCs.</p>
Overall risk rating	M	
<p>* Risk rating – H (high risk), S(Substantial risk), M (Moderate risk), and L (low risk). Risks refer to the possibility that assumptions, defined in the logical framework may not hold</p>		

B.5. Identify key stakeholders involved in the project including the private sector, civil society organizations, local and indigenous communities, and their respective roles, as applicable:

46. As mentioned above, the main beneficiaries of the project activities will be those already involved in the RTIMP programme that is: asset-poor, food-insecure and labour-deficient small-scale cassava farm households; small-scale cassava processors, both individually and in groups, whose incomes are depressed by lack of access to improved technologies, skills, capital and markets; and traders with interest and dynamism to become viable micro/small entrepreneurs. The project will put particularly strong focus on women and youths. At local level, the project will involve modern and traditional community leaders, including Chiefs (with a major stake in land tenure issues), as these key members of communities will be influential in engaging land users.
47. The project will also involve the other key stakeholders including RCC and DA staff (officers, extensionists, etc), research institutes and universities, NGOs, health centres, commission for civic education, staff of the Department of Meteorology, radio/newspapers managers. The project will build their capacity to incorporate climate change adaptation needs into their daily work and to become trainers/disseminators of climate change adaptation for the rural population –small scale cassava producers, processors and traders- who are most likely to be affected by climate change impacts.

B.6. Outline the coordination with other related initiatives:

48. This project is designed to implement the agriculture and food security elements of the National Climate Change Adaptation Strategy (NCCAS). It focuses on the climate change adaptation priorities proposed by the NCCAS, among others: CC awareness programmes for different social groups; research/promotion of climate change resilient crops and plant varieties; adjustments in agriculture production, based on conservation agriculture, integrated pest control, SLWM and promotion of agro-forestry; diversification of production and income-generating activities; innovative post-harvesting and processing technologies, making use of alternative and efficient energy sources; promotion of marketing policies; mainstreaming gender into adaptation responses.
49. The use of new technologies for high quality and more diversified cassava processing and food production will represent a major contribution to climate change adaptation, responding to multiple measures and recommendations proposed by the Strategic National Energy Plan (SNEP) and bio-energy policy, among others: (i) support education, training and awareness creation as well as incentives for the use of improved technologies, sustainable supply, production and utilisation of wood-fuel; (ii) monitor the health impact of wood-fuel production and use especially, on women and children; (iii) investigate innovative capital subsidy arrangements and micro-financing to assist rural communities acquire renewable energy technologies and provide decentralised renewable energy systems for individual and commercial needs; (iv) support the promotion of local manufacturing of renewable energy devices and equipment in the medium-to-long term; (v) promote the use agricultural waste as bio-fuel feed stock, as well as provide incentives for use of waste and promote more efficient conversion technologies, and efficient and adequate pricing of energy produced from waste. The use of sustainable energies to upscale cassava processing and food production will not only respond to the adaptation food security objectives (i.e. diversification of poor farmers' livelihoods and increase of market opportunities) but will also significantly reduced a number of cassava-related environmental stressors that will be exacerbated by climate change (among others, soil and water pollution; health problems; irrational use of firewood).
50. In terms of climate change adaptation, the SCCF project will benefit from the DANIDA funded climate change adaptation actions, based on the integrated water resource management (IWRM) approach, and implemented by the Water Resource Commission (WRC) in the three northern regions. Good examples of CC adaptive water resource management will be spread among users through study tours in the northern regions of Ghana, and demonstration pilot projects on adaptive water management will be implemented in the targeted areas, after a participatory process to identify the best options.

51. The SCCF project will also benefit from a number of studies and projects on climate change adaptation in Ghana, supported by international organizations, among others: The WB study on Economics of Adaptation to Climate Change in Ghana, that analyses the cost of adapting to climate change in different development sectors, and provides recommendations to incorporate adaptation measures in development plans; CARE's initiative on climate change and poverty in Ghana, that analyses the implications of climate change in the poverty reduction efforts implemented by this organization in Ghana; The Tropical Forest and Climate Change Adaptation Project (TroFCCA) carried out by the Centre for International Forestry Research and the Tropical Agriculture Research Centre in 8 tropical countries, including Ghana, with the aim to increase understanding of the adaptation needs and options for tropical forests and agro-forestry systems. The modified "taungya" agro-forestry system successfully implemented in the Offinso district will be adapted to the project target areas, and participatory process will be held in order to test and demonstrate a modified "taugya" system for the diversification of agriculture and forest goods production. Lessons learned from the FAO cassava supported activities, including the assessment of the impact of cassava production and processing on the environment and biodiversity will be also feeding into the implementation of the present project.

GEF AGENCY INFORMATION:

C.1 Confirm the co-financing amount the GEF agency brings to the project:

52. The total project cost is USD 11,485,000 over three years, covering the SCCF grant of USD 2,500,000 and co-financing sources of about USD 8,985,000 that are mainly corresponding to the investments of RTIMP (USD 8,521,000), and in-kind contribution of government (USD 314,000) and beneficiaries (USD 150,000).

C.2 How does the project fit into the GEF agency's program (reflected in documents such as UNDAF, CAS, etc.) and staff capacity in the country to follow up project implementation:

53. The SCCF proposal supports the implementation of the agriculture and food security adaptation priorities as identified by the Government in its climate-related national policies and plans (The second Growth and Poverty Reduction Strategy - GPRS II; The National Climate Change Adaptation Strategy – NCCAS; The National Land Policy; The Strategic National Energy Plan – SNEP; The Bio-Energy Policy – BEP; The National Water Policy.
54. The NCCAS recognises the limited capacity of both professionals at the national level and community level to understand and assess climate change impact. For this reason, capacity building will be a key success factor of the SCCF project, and will cover organizational, technical and also institutional aspects. The overall objective of the capacity building efforts are to ensure that all concerned stakeholders (at the regional, district and community level) have the necessary understanding of climate change impacts, vulnerabilities and adaptation options, and become able to integrate climate change adaptation as a new dimension in the sustainability of livelihoods, food security and food safety.
55. SCCF funds will target in particular women and youths, as they play a major role in subsistence food production and are particularly vulnerable due to the existence of non-climate stress factors. Capacity building activities will be organized at different levels: training for trainers, involving regional and district governmental and non-governmental organizations, and focus groups learning activities involving small householders and all concerned stakeholders supporting cassava production, processing and marketing operations. Thus, the capacity building efforts will provide regional and district stakeholders and local communities with the required decision-making, planning, implementation and monitoring skills in a manner that allows them to become more resilient to climate change impacts on their production, processing and marketing activities, and their livelihoods at large.

PART III: INSTITUTIONAL COORDINATION AND SUPPORT

A. INSTITUTIONAL ARRANGEMENT: .

56. The project will be fully integrated within the institutional arrangements of the RTIMP. In order to maximise synergy and ensure full integration between programmes, the PIM related to RTIMP will be updated with the operational elements of the new SCCF project during the inception phase. Coordination of the implementation and monitoring of the SCCF components will be ensured by a dedicated Programme Officer (PO) at and under the supervision of the overall RTIMP coordinator. Annual work programs and budget of the SCCF Component will be fully integrated with RTIMP, as well. The PO will ensure full harmonisation and integration between the AWPB of the SCCF and those of the RTIMP while coordinating the preparation of the SCCF AWPB at the national and district/community levels.
57. A National Project Coordination Unit (NPCU) will be set up, for overall coordination, supervision and monitoring, while most activities in the field will be carried out by Implementing Partners (contractors, NGOs, CBOs, local media and government agencies) on the basis of performance-based contracts and MOUs. The NPCU will consist of the overall RTIMP coordinator, the programme officer (PO), the RTIMP subject matter specialists (commodity chain linkages; production; processing/post-harvest; business development training; M&E; gender; and financial administration), the IFAD Programme Manager for GEF/LDCF/SCCF operations in Western and Central Africa, and support staff. The main responsibilities of the NPCU will include: (i) Ensuring harmonisation of approaches and activities of the various interventions in the Districts; (ii) preparing the AWPBs; (iii) operating the management information system, M&E and reporting systems; (iv) contracting out, on a competitive basis, the implementation of various project activities to implementing partners, service providers and technical assistance experts; (v) monitoring the progress of project activities and evaluating the performance of the different contractors; (vi) coordinating and consolidating periodical reports from implementing units and implementing partners; (vii) providing logistical, administrative and technical backstopping to implementing partners and district level implementing agencies; (viii) serving as the secretariat to the National Steering Committee and keeping MOFA and other government partners informed on a regular basis on project progress and any relevant issues; (ix) establishing and maintaining linkages with all relevant government ministries, donor institutions and service providers; (x) carrying out financial management and procurement of goods and services; (xi) reporting regularly to the funding agencies and to the government; and (xii) disseminating information about the Project's rationale, concept, content and progress to the concerned stakeholders and all interested parties.

B. PROJECT IMPLEMENTATION ARRANGEMENT:

58. The SCCF will be under direct supervision by IFAD and fully integrated in the supervision arrangements for the RTIMP. The SCCF project will be supervised as a component of the RTIMP. A separate project account will be established for the SCCF funds and IFAD will establish a separate Financial Agreement with the Government for the SCCF grant. The flow of funds will follow the modalities of the RTIMP.
59. Annual Review and Planning Workshops will be conducted at national and district levels as a basis for preparing Annual Work Programmes and Budgets (AWPBs). The due progress reports will be generated periodically by the team. At district level, the already existing District Steering Committees will be the entry point of the SCCF project implementation as they will be responsible for the RTIMP. The Project Steering Committee will be the same as the National Steering Committee for the RTIMP.
60. The National Country Programme Management Team (CPMT) put in place by MOFA to guide IFAD in the development of its portfolio in Ghana will also play a crucial role in the implementation of the SCCF project. The CPMT consist of: (i) Oversight Committee (including members from the governmental institutions MOFEP, MOFA, MOWAC and Bank of Ghana; the local representatives of IFAD, AfDB, GIZ and WB; the coordinators of major Agriculture Value Chain Programmes, including RTIMP among others; National Financial Institutions; support institutions, such as research centres; farmers' associations); (ii) In-Country Technical Advisory Group, including governmental, intergovernmental, financial private sector and academic staff; (iii) IFAD In-House staff. In recognition of the fact that the IFAD portfolio is entirely implemented by MOFA and managed by one PCU, it is envisaged to merge the National Steering Committee with the CPMT, in order to avoid duplication and increase harmonisation.

Part IV: Explain the alignment of project design with the original PIF

The project is fully aligned with the original PIF. Co-financing estimation has not increased. Allocation across components has been respected. No change in the baseline investment.

PART V: APPROVAL/ENDORSEMENT BY GEF OPERATIONAL FOCAL POINT(S) AND GEF AGENCY(IES)

A. RECORD OF ENDORSEMENT OF GEF OPERATIONAL FOCAL POINT(S) ON BEHALF OF THE GOVERNMENT(S): (Please attach the Operational Focal Point endorsement letter(s) with this template. For SGP, use this OFP endorsement letter).

NAME	POSITION	MINISTRY	DATE (MM/dd/yyyy)
Mr Jonathan A Allotey	GEF Focal Point for Ghana	Environment/EPA	9 September 2010

3.

GEF AGENCY(IES) CERTIFICATION

This request has been prepared in accordance with SCCF policies and procedures and meets the SCCF criteria for CEO endorsement/approval of project.

Agency Coordinator, Agency Name	Signature	Date	Project Contact Person	Telephone	Email Address
Mr Kevin Cleaver Associate VP, Programs		16-12-2012	Mr Naoufel Telahigue	+390654592572	n.telahigue@ifad.org

ANNEX A: PROJECT RESULTS FRAMEWORK

<i>SCCF Goal & Objectives</i>	<i>SCCF Key Performance Indicators</i>	<i>Means of Verification</i>	<i>Assumptions and Risks</i>
<p>SCCF Goal Reduce the vulnerability of the food supply system to the deleterious impacts of climate change</p>	<p>Contributions to the NCCAS objectives to increase resilience of key agricultural production systems to climate change impacts in Ghana</p>	<p>Project M & E system Local and national assessments of food security mid term and project completion</p>	<p>Political and economic stability in Ghana.</p>
<p>SCCF Objective To promote activities that reduce climate-induced risks to the achievement of food security and income generation objectives for the rural communities in Ghana.</p>	<p>At least 70 % of supported beneficiaries report ability to maintain or increase healthy food production in the event of harsh climatic conditions Climate resilient sustainable land and water management practices introduced to promote food security in 144 farm plots Innovative solutions along agriculture value chain for climate resilient diversified income sources for vulnerable households promoted in 34 community groups, and benefiting about 7,200 cassava growers and processors</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Agreements and memoranda of understanding Feedback from users and stakeholders Media articles and footage</p>	<p>Strong commitments to address negative impacts of climate change on food security in Government, concerned Ministries and at involved district Assemblies in Ghana. Appropriate technology and means available. Local capacity can be built adequately</p>
<p>Output</p>	<p>Activity and Key Indicators</p>	<p>Means of Verification</p>	<p>Assumptions and Risks</p>
<p><i>1. Awareness raising on climate change and capacity to address its impacts along cassava value chain/other complementary food crop production</i></p>			
<p><i>Outcome 1.1: Increased awareness and capacity of small producers, formal/informal organizations of growers, processors, and traders about climate change impacts and adaptation on agricultural value chains and related livelihoods/ Contributors to CCA-2</i></p>			
<p>1.1.1. A climate change capacity building programme and awareness raising campaign are designed and tools produced</p>	<p>25 RTIMP, Extension, and Research staff are trained on participatory climate-risk assessment and vulnerability mapping 12 consultation sessions (4 in PY1,4 in PY2, and 4 in PY3) undertaken in 20 of communities. Climate-related risks and vulnerability mapping is undertaken with 20 local communities in the project targeted areas in PY1 and integrated in a GIS/Monitoring Information System. Equipment (GIS requirements, GPS, etc) are procured in PY1 and climate-related impacts and vulnerability assessment conducted</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Reports of field visits Enquiries and requests from target users Maps produced Tools produced Feedback from users and beneficiaries</p>	<p>Availability of good expertise, transferable lessons, and knowledge. Project team has access to information and data and is capable of using it to design effective programme.</p>

	<p>annually.</p> <p>Set of materials (handbook cultural-adapted jingle (songs), pictorial materials, leaflets and posters, info kits) produced in local languages, and distributed to users.</p>		
<p>1.1.2. The capacity of targeted groups to mainstream climate change adaptation into their professional activities is built.</p>	<p>10 trainers from 10 cassava-producing districts in 3 Agro-climatic Zones (Guinean Savanna, Transition, and Deciduous Forests) are trained to carry out community-workshops on climate change impacts and adaptation needs/options (50 in Yr 1; 50 in Yr 2).</p> <p>40 community capacity building workshops and 4 training sessions on climate change related issues undertaken to benefit 2,000 women, youth and men of vulnerable households, local/district/regional community and commercial radio stations.</p>	<p>Project M & E system</p> <p>Progress reports</p> <p>Minutes of meetings and workshops</p> <p>Lists of participants</p> <p>Feedback from users and beneficiaries</p> <p>Increased attention of the media to the topic (articles, video footage)</p> <p>Mid-term and final project evaluations</p>	<p>Trainees and users are willing and able to join the training programme.</p> <p>Local media are willing to support the programme and become involved.</p> <p>People perceive the weather as supernaturally determined so even good meteorological information may not be well utilised.</p>
<p>1.1.3. The awareness of the society in the project targeted areas is raised on climate change and adaptation needs and mechanisms.</p>	<p>Pilot non-formal education activities in 2 pilot schools per each of the 3 agro-climatic zones organized.</p> <p>Radio campaigns on climate change and adaptation designed and launched in at least 1 community-radio station and 1 commercial radio station in 4 regions (Ashanti, Brong-Ahaho, Northern, and Volta) (i.e. every two months, right before key agriculture periods like planting season and harvesting season; etc).</p> <p>Equipment (10 community announcers, 1 info van, etc) is procured in PY1 and climate change-related announcements conducted every month (PY1, PY2, PY3).</p>	<p>Project M & E system</p> <p>Progress reports</p> <p>Mid-term and final project evaluations</p> <p>Radio footage</p> <p>Equipment</p> <p>Feedback from target groups</p>	<p>Local NGOs and radio station and willing and capable of becoming involved.</p> <p>School authorities are cooperative and supportive.</p> <p>Radio programs are successful in capturing the attention and generating the interest of local communities.</p> <p>People perceive the weather as supernaturally determined so even good meteorological information may not be well utilised.</p>
<p>1.1.4. Study visits to Congo, Cameroon, Nigeria, and Benin undertaken to promote adaptation benefits arising from the proposed approach and scaling up of the new technologies</p>	<p>At least 40 people representing different stakeholder groups have participated in learning tours in PY 2 and PY 3.</p> <p>150 press news in Ghana and WCA participating countries highlighting the experiences of the model-processing unit.</p>	<p>Agenda and list of participants, trip reports.</p> <p>Pictures and video footage.</p> <p>Feedback from trainees.</p> <p>Project reports.</p>	<p>West and Central African partners are willing to cooperate and fine experiences available.</p> <p>Local stakeholders are happy to become involved in study tours and learning processes.</p>
<p><i>Outcome 1.2: Climate meteorological information is made available to inform agricultural investments and planning decisions/ Contributes to CCA-2</i></p>			
<p>1.2.1. Meteorological staff, farmers and processors are</p>	<p>By PY 1, 6 national/regional meteorological staff trained abroad on advanced agro-climatology management and climate change</p>	<p>Project M & E system</p> <p>Progress reports</p>	<p>Meteorological services are knowledgeable on climate</p>

<p>empowered in the use of agro-meteorological information integrating CC through equipment and training.</p>	<p>modelling. By PY 1, 4 basic meteorological stations purchased and installed in 16 districts per region: Ashanti, Brong-Ahafo, Northern, Volta). By PY 2, 8 community groups of farmers and processors trained on the use of basic meteorological stations to help plan production decisions according to climate variability. At least 200 beneficiaries receive relevant meteorological forecasts (through mobile SMS or community announcements) on a regular basis and in a timely fashion.</p>	<p>Mid-term and final project evaluations Educational records and university certificates Minutes and report from training sessions Agreements and memoranda of understanding Leaflets</p>	<p>change and fully involved in the project. Commitment and co-operation of the staff from the Department of Meteorology. Suitable staff in service. Staff is willing and capable of spending 1 year abroad on study mission.</p>
<p><i>2. Support adaptation to climate change of cassava production</i></p>			
<p><i>Outcome 2.1: Cassava production is more resilient to climate change impacts and its quality is maintained despite risk of deterioration associated to climate impact / Contributes to CCA-1</i></p>			
<p>2.1.1. Probability of CC-associated yield losses reduced</p>	<p>400 training materials on CC-adaptation cassava production guidelines produced and used by 200 beneficiaries. 200 beneficiaries trained on CC-adaptation cassava production guidelines and 8 types of agricultural equipment purchased and distributed to 16 beneficiaries in PY1 and PY2. At least 80 % of cassava experimental plots have used climate resilient cassava varieties with higher yields than the baseline (equal or more than 20 MT/ha) by PY3.</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Agreements and memoranda of understanding Pictures and video footage documenting the process Education materials Feedback from users and beneficiaries</p>	<p>The involvement of local farmers and communities is enthusiastic and unrestricted. Linkage of local farmers with SLARI and LWDD</p>
<p>2.1.2. Adaptive research on drought-resistant and improved varieties undertaken</p>	<p>One training visit per year with 15 participants (farmers, research and extension workers) from Ghana and other cassava producing countries with high expertise on CC adaptation and cassava varieties organized. 200 (of whom, 30% women) farmers trained on the use of CC resilient cassava varieties to address adaptation to climate change (4X trainings x 200 farmers field fora x 3 years). Research results available in local languages on the web (project data-base), and translated into cultural-friendly web info sections/leaflets. Plant material of CC resilient cassava varieties to cover 75% (50% in PY3) of the needs is distributed to project beneficiaries in PY2. 64 Soil fertility test kits and 64 cyanide field kits are distributed to farmer groups in the targeted districts.</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Feedback from users and target groups Reports, pictures and other material from training visits Agreements and memoranda of understanding</p>	<p>Local actors are willing and capable to become involved. Good experiences and know-how available in other cassava producing countries. Stakeholders from other countries of West and Central Africa are willing to cooperate. Material, equipment and plants are produced and/or purchased in a timely fashion.</p>
<p>2.1.3. Higher level of forecasting and prevention of</p>	<p>Training provided to 10 staff from local/regional meteorological and</p>	<p>Dissemination tools</p>	<p>Commitment and co-operation</p>

<p>CC- related pests and diseases promoted (time bound with Outcome 1.2.2)</p>	<p>agriculture research centers (PY 1) Local climate change scenarios for agriculture and pests/diseases developed (PY 1) and used in agriculture decision planning (national, regional, local) (PY 2 and PY 3). 80% of project beneficiaries integrate local knowledge, climate scenarios and agro-meteorological data in decision-making at the community level by PY 3.</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Education records and university certificates</p>	<p>of Department of Meteorology and Agronomic staff Suitable staff in service Staff is willing and capable of spending 1 year abroad on study mission.</p>
<p>2.2.1. Adaptive water harvesting demonstrated and promoted successfully</p>	<p><i>Outcome 2.2: Risk to cassava production associated with water scarcity mitigated / Contributes to CCA-1</i> 40 trainers (Extension workers; researchers; municipal planners; RTFs; RTIMP staff) trained on CC-adapted water harvesting systems and techniques. 4 participatory sessions on integrated water resource management with local stakeholders held in PY1 and 2 in PY2. CC-adapted water harvesting equipment provided and installed in two pilot areas (PY 2). 50% decrease of project beneficiaries in water vulnerability during the dry season (PY 3)</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Agendas and lists of participants for the study tours Feedback from participants and beneficiaries.</p>	<p>Full involvement of local farmers and communities enthusiastic and unrestricted. Local farmers are engaged with Water Resource Commission. Pilot projects are properly implemented and structures maintained.</p>
<p>2.3.1. Adaptive land management practices implemented and successfully contributing to soil and water conservation</p>	<p><i>Outcome 2.3: Agro-ecosystem resilience to climate change strengthened / Contributes to CCA-1</i> Bimonthly training sessions on SLM and soil/water conservation techniques provided to 100 farmers (50 in PY1 and 50 in PY 2) 64 sustainable land and water management demonstration plots promoted by 200 (of whom, 30% women) farmers in 16 districts over 100 ha (60 ha in PY2 and 40 ha in PY3). 4 sets of equipment (i.e. mechanisation needs) for SLM provided to 32 farmer associations or community groups Soil and water moisture conditions improved in 100 ha of land by PY 3</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Field monitoring surveys Agreements and memoranda of understanding</p>	<p>Full involvement of local farmers and communities enthusiastic and unrestricted. Local stakeholders appreciate “win-win” potential of SLWM approaches to adapt to impacts of climate change. Planning exercise carried out effectively and timely. Involvement of local stakeholders and communities enthusiastic and unrestricted. Linkage of local farmers with agriculture research institutions. A valuable experiences in other part of Ghana can be successfully adapted and transferred to the project areas.</p>
<p>2.3.2. Agro-forestry promoted in selected sites</p>	<p>32 community environmental-sound agro-forestry plans agreed, developed and implemented. Increase in revenue diversification rate (80 % of beneficiaries participating in agro-forestry demonstration initiatives have increased their revenues by PY3) At least 50 % of beneficiaries participating in agro-forestry demonstration initiatives have reported reduced impact of unusual climate events on their crops.</p>	<p>Project M & E system Progress reports Mid-term and final project evaluations Agenda and list of participants of the study tour</p>	<p>Involvement of local stakeholders and communities enthusiastic and unrestricted. Linkage of local farmers with agriculture research institutions. A valuable experiences in other part of Ghana can be successfully adapted and transferred to the project areas.</p>
<p><i>3. Promote innovative adaptation solutions along agriculture value chain</i></p>			
<p><i>Outcome 3.1: Successful adoption of innovative solutions that contribute to adaptation in the targeted area and sub-sector / Contributes to CCA-3</i></p>			
<p>3.1.1. Environmental-friendly technologies for energy</p>	<p>5,000 MT (PY 1) to 8,000 MT (PY 3) of raw cassava per year are</p>	<p>Report from study tour, agenda and</p>	<p>Project team is able to</p>

<p>production and use to support CC adaptation for food safety and food security in the cassava value chain demonstrated and promoted</p>	<p>processed, with sustainable energy sources, into high-quality cassava derivatives. 3,200 households (about 800 cassava farmers) have substituted fossil fuel and firewood is almost completely eliminated for the processing of cassava. Gasification and biogas pilot plants have replaced up to 265,000 l/y of "diesel" required to operate the new facilities equipment and the motorised roasters; 1,500 MT/y of fire wood to produce 500 MT/y of gari. Approx. 7,500 beneficiaries (cassava processors and producers) are applying sustainable firewood management practices and uses in cassava processing (PY 2 and PY 3), and 1,500 MT of cassava peels per year are no longer disposed in the environment causing pollution problems.</p>	<p>list of participants. Memoranda of understanding and agreements. Mid-term and final project reports. Feedback from users and beneficiaries. Pictures and video footage. Building plans, reports. Environmental monitoring reports and assessments, chemical analyses.</p>	<p>successfully lead establishment of model processing units. Materials and technology are readily available. Permits and approval duly obtained from local and national authorities. All stakeholders are willing to cooperate and play respective roles in a timely fashion.</p>
<p>3.1.2. Energy-operated water pumping system installed in the cassava model-processing unit, to supply the necessary water, based on the integrated water resources management approach.</p>	<p>8,250 m³/year (25 m³ x 330 days/year) of wastewater treatment for bio-gas generation in Asueyi (Techiman Municipality). Water tests proving an abatement of environmental pollution (soil, groundwater, etc) in Asueyi (Techiman Municipality).</p>	<p>Assessment reports and studies Agreements with users/beneficiaries Feedback from users Pictures Evaluation reports from the activity Water tests and reports.</p>	<p>The required technology, information and data are readily available Users are willing and capable of collaborating</p>
<p><i>Outcome 3.2: Diversified livelihoods and socio-economic impacts of climate change mitigated / Contributes to CCA-3</i></p>			
<p>3.2.1. Climate-resilient complementary income sources created for cassava producing and processing communities</p>	<p>100 Kg/straw mushroom produced per demonstration pilot site by PY 3. 3 MT tones of total consumption of fresh cassava peels are consumed per year avoiding pollution to the environment. 15 young entrepreneurs (half of them being women) trained in growing local straw mushroom making use of cassava peels. 50 beekeepers equipped with input package and trained on improved honey production, extraction technology and marketing. 2,850 kg high quality honey (11.4 kg/beehive/year x 250 beehives) produced per year (PY 2 and PY 3).</p>	<p>Project reports Agreements and memoranda of understanding with users Minutes from meetings Pictures and video footage Publications on mushroom production Evaluation reports of the activities Proves of purchase of materials Minutes and reports from training sessions.</p>	<p>Materials and equipment are readily available The producing and processing communities are eager and capable of collaborating Technical capacity to design and install equipment is found in the team Reference experiences and data are available The market is ready to absorb complementary produce</p>
<p><i>4. Project Management and M&E</i></p>			
<p>Project Management</p>	<p>Project coordinator, assistant and driver in place and operational. Project vehicle purchased and operational. Written procedures and governance rules produced and available.</p>	<p>TOR and job postings Project M & E system Progress reports</p>	<p>SCCF component management officer has relevant expertise (good understanding of adaptation issues)</p>

Project M&E		Mid-term and final project evaluations	Efficient administrative processes are
	<p>SCCF M&E requirements are fully met.</p> <p>Project M&E system is fully aligned with RTIMP</p> <p>Good quality progress reports are produced.</p> <p>Key indicators:</p> <p>Positive input provided on M&E procedures and system.</p> <p>Progress reports available.</p>	<p>Project M & E system</p> <p>Progress reports</p> <p>Mid-term and final project evaluations</p>	<p>Data is captured and recorded regularly</p> <p>Good flow of exchange with RTIMP</p> <p>Timely evaluations and reports</p>

ANNEX B: RESPONSES TO PROJECT REVIEWS (from GEF Secretariat and GEF Agencies, and Responses to Comments from Council at work program inclusion and the Convention Secretariat and STAP at PIF). All comments have been accommodated.

ANNEX C: CONSULTANTS TO BE HIRED FOR THE PROJECT USING GEF/LDCF/SCCF RESOURCES

<i>Position Titles</i>	<i>\$/ Person month*</i>	<i>Estimated Person months**</i>	<i>Tasks To Be Performed</i>
For Technical Assistance			
Local			
Climate Change Adaptation & Agriculture Expert	6,090	15	<ul style="list-style-type: none"> - Gather and compile all relevant available information on climate change adaptation in the project area and edit it in a user-friendly baseline-working document. - Identify set of baseline indicators to monitor project progress on climate change adaptation. - Support International Consultant in his/her capacity building task and facilitate the work with local stakeholders. - Perform backstopping and advisory role for the management team during project implementation. - Contribute and provide technical inputs in the elaboration of the climate change-related documents and publications released by the project. - Attend meetings, workshops and other events organized by the project as a resource expert on climate change adaptation.
Participatory Rural Appraisal Expert	6,090	15	<ul style="list-style-type: none"> - Identify target audiences, information gaps, and resources needed to raise awareness of local stakeholders about the project and the issues dealt. - Work with International Expert on Community-based CC-risk screening tools to ensure effective transfer of knowledge and adaptation of methodology on climate change adaptation. - Lead participatory appraisal process with key local communities aimed at reaching shared consensus on the problems and the strategy to tackle the climate change challenges addressed by the project. - Foster a favorable community participation environment that can facilitate project implementation and achievement of results. - Facilitate the involvement of grassroots communities in all the steps of the project. - Support project team in the design and implementation of appropriate capacity building actions.
Education and Curriculum Development Expert	6,090	12	<ul style="list-style-type: none"> - Design tools, materials, and programmes aimed at introducing climate change adaptation in the informal curricula of the schools targeted by the project. - Train and support local NGOs in the implementation of the education programme.
Sustainable Water Management Expert	6,090	8	<ul style="list-style-type: none"> - Gather available relevant information on sustainable water management in Ghana and streamline existing knowledge and know how into the project work plan. - Liaise with district agents in charge of water management for the issuing of needed permits and the planning and implementation of fieldwork. - Interact with local stakeholders and bring technical contribution in the participatory process aimed at obtaining buy in of users in the development and implementation of water management plan. - Act as a resource person and perform backstopping role on all issues related to sustainable water

Sustainable & Adaptive Land Management Expert	6,090	11	<p>management.</p> <ul style="list-style-type: none"> - Gather available relevant information on CC adaptation methodologies in the management of agriculture land in West and Central Africa and streamline existing knowledge and know how into the project work plan. - Liaise with agriculture extension agents and researchers for the planning and implementation of fieldwork. - Interact with local stakeholders and bring technical contribution in the participatory process aimed at obtaining buy in of users in the development and implementation of agriculture land adaptation management plans. - Act as a resource person and perform backstopping role on all issues related to CC adaptation and sustainable management of agriculture lands.
Expert in modified Taunjya Agro-forestry System	6,090	9	<ul style="list-style-type: none"> - Train local project team on modified Taunjya Agro-forestry System. - Lead information and awareness raising sessions on Taunjya Agro-forestry System for local farmers, aimed at securing their buy-in and active participation. - Develop a model for the application of Taunjya Agro-forestry System in cassava croplands of targeted areas, identifying criteria and solutions for successful adaptation. - Ensure transfer of lessons learned, techniques and approaches of Taunjya Agro-forestry System to the project area. - Monitor the implementation of Taunjya Agro-forestry System adoption in project area.
TOTAL (US\$)	426,300		
Justification for travel, if any: The project will be implemented across a large area – travel will be required to provide technical support in the field and supervise project activities, as well as to interact with the stakeholders and to ensure effective project implementation.			
For Technical Assistance	\$/ Person month*	Estimated Person months**	
International			
Agriculture and Climate Change Adaptation Expert	11,185	2	<ul style="list-style-type: none"> - Assess knowledge gaps and train project team on CC adaptation in agriculture with specific focus on project work plan. - Provide technical input in the production of reports, materials, training modules and all technical documents issued by the project, as appropriate. - Support local management team and national consultant in the planning of all CC adaptation related work in the project. - Act as a resource person and backstopping expert on all CC adaptation related work. - Lead elaboration of a M&E to monitor the performance and effectiveness of the project. - Attend workshops and meetings as appropriate.
Expert on Community-based CC-risk screening tools	11,185	3	<ul style="list-style-type: none"> - Train local team and Participatory Rural Appraisal Expert on methodology and techniques for working with rural communities on CC-risk and adaptation. - Support the design and production of all tools and materials needed for the implementation of the work. - Attend first stages of the work with rural communities to assess performance of extension staff and help fine tune their work and improve impact and effectiveness. - Advise project team on the communication of the results obtained by the project in this field in order to magnify its impact at the regional scale.

Expert on CC modelling and meteorological forecast Applied to agriculture	11,185	3	<ul style="list-style-type: none"> - Provide technical support (including: on-line distance course, field mission to lead the design of downscaled local climate modelling methodology) to National Meteorological Services to generate empirical downscaled local climate modelling. - Supervise and monitor the put into practice of the work in this sector through periodic visits to the project and remote advise. - Support local team in using the existing downscaled data to inform farmers and policy makers and improve decision-making and strategic planning. - Foster and facilitate set up of local "climate change adaptation platforms", as a means of promoting collaboration between scientists and practitioners, and enhancing local adaptation capacity including the ability to draw on climate data.
Expert on water management and CC adaptation	11,185	1	<ul style="list-style-type: none"> - Provide technical inputs to the choice, design and implementation and monitoring of the water use efficiency techniques that will be disseminated to ensure adaptation to the increasing risk and impact of CC. - Facilitate the put into practice of decisions taken on water management, feed technical advice to the project team and stakeholders on the design and maintenance of investments. - Provide inputs to the M&E system (valuing the added value and impact of the water management techniques in terms of adaptation).
Expert in Payment for Environmental Services	11,185	5	<ul style="list-style-type: none"> - Train local project team and other stakeholders on PES policies, mechanisms and best practices from abroad. - Assess national policy framework to identify gaps and opportunities for PES implementation. - Compile detailed overview of environmental goods and services, market opportunities and drivers of growth in the project area, including set of practical recommendations for the introduction of PES mechanisms. - Help the project team promote the set up of PES in the project area by using available policy framework and instruments and developing new ones, building on available experience from abroad.
Expert on Conservation Agriculture (CA)	11,185	1	<ul style="list-style-type: none"> - Provide technical inputs to the choice, design and implementation and monitoring of the land management techniques (based on CA) that will be disseminated to ensure adaptation to the increasing risk and impact of CC. - Facilitate the put into practice of decisions taken on land management, feed technical advice to the project team and stakeholders on the design and maintenance of investments. - Provide inputs to the M&E system (valuing the added value and impact of the land management techniques in terms of adaptation).

Bio-energy Expert	11,185	5	<ul style="list-style-type: none"> - Review the feasibility studies produced by experts during project formulation phase. - Build capacity of project team through organisation of visits to existing plants outside Ghana. - Identify suppliers of equipment needed to set up the biogas and gasification plants to be built by the project, and support the tender process to acquire the materials. - Supervise the construction of the plants and provide all needed technical assistance for efficient functioning. - Participate into the process of negotiating replication of the plants at the national level with decision makers and representatives of the private sector.
TOTAL (US\$)	223,700		
Justification for travel, if any: This activity will require intensive field work (site visits, interaction with stakeholders etc.).			

* Provide dollar rate per person month . ** Total person months needed to carry out the tasks.

A. EXPLAIN IF THE PPG OBJECTIVE HAS BEEN ACHIEVED THROUGH THE PPG ACTIVITIES UNDERTAKEN.

The PPG was instrumental in providing detailed information for the full project design. Of particular importance a cost-benefit study was carried out during the PPG and has been a key piece to demonstrate the cost-effectiveness of the proposed project. Also the consultations with different stakeholders during project design have helped in raising the awareness about this project and in getting various views in terms of technical and institutional issues. The PPG reached its objectives

B. DESCRIBE FINDINGS THAT MIGHT AFFECT THE PROJECT DESIGN OR ANY CONCERNS ON PROJECT

Project Preparation activities	Implementation	Amount approved	Amount spent to date	Amount committed	Uncommitted amount	Co-financing
Project Preparation activities approved	Implementation	Amount approved	Amount spent to date	Amount committed	Uncommitted amount	Co-financing
Study on training and awareness needs on climate change and design of related communication and capacity building activities	Completed	6250	5471	2000	-1221	11000
Study on social implications of climate change in the project area, with a focus on women	Completed	6250	7590	2000	-3340	9000
Assessment of climate change impacts on the targeted production systems (R&T) in the project area and related responses	Completed	10500	7594	2000	906	13000
Economic assessment, cost-benefit analysis and financial description of proposed adaptation alternatives	Completed	10800	6517	4000	283	12872
Technical and institutional design of adaptation investment, implementation modalities and integration of the SCCF component within the baseline	Completed	23000	19352	4590	-942	18000
Feasibility study on the technical and financial potential of different types of technologies for adaptation.	Completed	4000	5000	0	-1000	12000
Travels	Completed	39200	17666	0	21534	15000
Stakeholder consultations	Completed	0	0	0	0	7000
PPG management	Completed	0	0	0	0	25000
Total s		100000	69188	14590	16220	122872

IMPLEMENTATION, IF ANY: Two major factors may impact on project implementation: (i) the potential gap between the SCCF and the baseline (in terms of timing) if the SCCF start suffers from significant delays and (ii) the institutional arrangements around the management of the bioenergy plant that will be crucial for successful project implementation and impact on the beneficiaries. These two aspects were acknowledged as risks and mitigation measures should be considered.

C. PROVIDE DETAILED FUNDING AMOUNT OF THE PPG ACTIVITIES AND THEIR IMPLEMENTATION STATUS IN THE TABLE BELOW:

ANNEX D: STATUS OF IMPLEMENTATION OF PROJECT PREPARATION ACTIVITIES AND THE USE OF FUNDS

This current PPG balance at the submission. It will be confirmed once all encumbrances are expensed.

ANNEX E: CALENDAR OF EXPECTED REFLOWS (if non-grant instrument is used) - NA

Provide a calendar of expected reflows to the GEF/LDCF/SCCF Trust Fund or to your Agency
(and/or revolving fund that will be set up)