

TYPE OF TRUST FUND: GEF Trust Fund

**Submission date**: 02/02/2011

GEF PROJECT ID: 4464 GEF AGENCY PROJECT ID: COUNTRY(IES): Nepal

**PROJECT TITLE:** Integrating Traditional Crop Genetic Diversity Into Technology: Using A Biodiversity Portfolio Approach To Buffer Against Unpredictable Environmental Change In The Nepal Himalayas

**GEF AGENCY(IES)**: UNEP, (select), (select)

**GEF FOCAL AREA(s):** Biodiversity

#### A. PROJECT PREPARATION TIMEFRAME

Start date of PPG	01/08/2011
Completion date of PPG	02/01/2013

#### **B.** PROPOSED PROJECT PREPARATION ACTIVITIES (\$)

Describe the PPG activities and justifications:

The PPG process will include implementation of the following activities:

1. Definition of project components, feasibility analysis and budget.

The PPG resources will be used to consolidate and analyse the biophysical and socio-economic information relevant for detailed formulation of the porposed project intervention for the application of using a biodiversity portfolio approach to buffer against unpredictable environmental change in agricultural ecosystems of the Eastern Himalayas. This analysis will enable a more precise understanding of the constraints that impede the application and uptake of biodiversity rich solutions to buffer against unpredictable environmental changes thereby facilitating the final definition of activities required at the systemic and pilot site levels in the FSP. Analysis will be used to provide a profile of environmental diversity that will allow site selection. Numerous sites are needed, given the high unpredictability and heterogeneity of mountain environments. Analysis will compile information specific to the proposed projects sites on (i) the internaction of high elevation grassland and agricultural lands and their management, (ii) intraspecific diversity of target crops together with, local adaptations, continuum of diversity from cultivated to wild forms; (iii) human social and cultural diversity, and diagnostic on-farm information on biological constraints; (iv) levels of community co-operation, conservation interventions, institutional capacity, on-site expertise in cold and drought management in high moutain environments. The compiling of local and national information will (i) allow further characterization of the constraints faced by stakeholders to maximise conservation benefits from the use of diversity rich agricultural practices, (ii) precisely define capacities required for the future up-take of diversity rich practices for maximising global, regional and national benefits; (iii) synthesize and refine methodologies to be applied in the FSP for conservation and use of on farm diversity and the role this diversity plays in supporting other ecosystem services, and (iv) define pilot sites to used and mainstream focal points for the project. The analysis will include a review of current methodologies being developed by other GEF Implementing agencies to measure the impact of GEF projects on the maintenance of agricultural biodiversity under in different landscapes and climatic conditions. It will also include the further identification and assessment of on-going and proposed projects that would complement the FSP either through providing co-funding or critical baseline interventions as well as plan for speciic collabortaive agreemets with the mangement units of these projects to achive full complementarity.

PPG funds will be also used to assess the feasibility for the proposed project intervention that will include the following: (i) Validating the set of proposed project outcomes, outputs and activities, based on a logical framework analysis and the definition of expected benefits, cost effectiveness and sustainability of different approaches; (ii) Selecting a set of indicators for determining the impact of project outcomes; (iii) An incremental cost analysis in compliance with the GEF incremental cost principles; (iv) Development of detailed financial plan for the project - costing the expected project outcomes and outputs; (vi) An assessment of the social, economic and financial sustainability of proposed project activities; (vii) Assessment of the social, political and environmental impacts of the proposed project. (viii) Assessment of the risks to the proposed project strategy and identifying measures to mitigate them; (ix) Assessment of alternatives to the project strategy and establishment of the cost effectiveness of the preferred strategy and suite of activities; (x) A replication strategy for project activities; (xi) Finalizing co-financing sources and commitments.

Assessment of institutional coordination requirements for stakeholder participation for uptake, support and mainstreaming biodiversity rich options and for the FSP implementation. Mainstreaming the use of biodiversity rich options into agricultural production systems in mountain environments, including access and benefit sharing will require the participation and coordination of multiple stakeholders at local community, national and transboundary levels. The main stakeholders to be involved are farmers, farmer organizations, women motivators within the farming communities, community based organizations, non-government organizations, agricultural and grassland extension workers, natural and social science researchers from universities and agricultural research institutes, and government ministries of agriculture and the environment, and international organizations with transboundary responsibilities. As farmers are the direct implementers of managing diversity on-farm, their participation is the foundation of the project and their needs and capacity will be assessed in preparation for the FSP. Farmers' organizations, community based organizations or non-government organizations will be assessed for their ability to local support to this initiative by representing and mobilizing local communities and to implement activities related to public awareness, access and holding information on plant genetic resources matters and to represent local, regional or national interests. Local, national, regional, and international institutions with relevant expertise will be identified and assessed for their capacity and willingness to contribute to the project. Private sectors will be accessed in their willingness to conduct ABS model agreements with local communities.

The PPG will finance capacity assessments and consultations with representatives of these different stakeholder groups at the local, national level and regional level to define capacity and outreach needs for the FSP. Work will include the following: (i) an analysis of existing coordination procedures and strategies between sectors and the different levels of government that could be used as mechanisms to ensure coordination in the FSP; (ii) an analysis of programmes and past and on-going projects to identify successful institutional models and best practices for implementation arrangements, (iii) establishment of a national planning teams. National teams will comprise in-country stakeholders from farmer organisations, agricultural extension programmes, scientific institutes and government ministries. Representation from the following types of expertise will be included: agricultural biodiversity, population genetics; agro-ecology; economics, policy, participatory approaches, adaptive biology to stress, environmental impact, and extension. Findings will also be used to define coordination mechanisms for all parties in the FSP, arrangements for implementation and the consolidation of a stakeholder matrix and stakeholder involvement plan.

3. Policy and institutional framework review to identify requirements and opportunities available for ABS and other benefit sharing mechanisms to mainstream agrobiodiversity into agriculture and other productive sectors in the Eastern Himalayas. PPG funds will be used to review information on local, national and transboundary planning, policy, and regulatory frameworks governing agriculture, grasslands, extension, and trade in the Eastern Himalayas. It will specifically focus on compiling incentive for

benefits to flow to custodians and other stakeholders managing biodiversity, and on reviewing existing models for ABS and Prior Informed Consent (PIC) nationally, and internationally in similar mountain environments. Procedures for identifying actors who are sources of raw and improved genetic materials and information will be formulated, and check lists prepared for identifying incentives and disincentives for different stakeholders to participate in collaborative agreements with farming communities. In doing so, it will profile the different types of incentives and disincentives of different stakeholders to promote ABS and other benefit sharing activities with indigenous communities in the project area.

4. Monitoring and evaluation mechanisms defined to measure the performance and impacts of actions to overcome barriers mainstreaming biodiversity rich options in to agriculture and other production systems, and to assess ensuing benefits (including biodiversity conservation, ecosystem services, global tools to increase the use of agricultural biodiversity within cold mountain environments, community based conservation models and tools for areas of high environmental instability)

PPG funds will be used to assess the existing monitoring and evaluation systems and capacity used in relevant institutions to construct an appropriate monitoring and evaluation system for the project that will:
(a) enable the adoption of adaptive management strategies during project implementation; (b) facilitate the evaluation of the project on completion; and (c) provide the basis for measuring benefits from the project and the contribution of each mechanism to national conservation targets. Activities will also include: (i) Development of key indicators and monitoring strategy for the FSP; (ii) Reviewing measures planned to monitor the application of project activities; (iii) Formulation of the project M&E plan with quantitative baseline, targets and indicators including M&E budget; (iv) Development of the costed project supervision plan; (v) Completion of the full project GEF SO2 Tracking Tools.

List of Proposed Project	Output of the PPG	Trust	Grant Amount	Co-financing	Total
Preparation Activities	Activities	Fund	(a)	(b)	c = a + b
1. Definition of project	Full project logical	GEF TF	32,500	60,000	92,500
components, feasibility	framework including				
analysis and budget.	outcome impact				
	indicators; incremental				
	cost analysis; risks				
	mitigation and				
	replication strategy;				
	Project sites precisely				
	defined;				
	Agreed details of				
	project outcomes,				
	outputs and activities				
	based on a logical				
	framework analysis;				
	Detailed work plan;				
	Costed baseline;				
	Detailed easting of the				
	Detailed costing of the				
	expected Outcomes	1	1		

	1	1			
	and Outputs - itimised				
	FSP budget;				
	Full project co-				
	funding secured;				
	Procurement plan.	OPP TP	20.000	07.500	117 500
2. Assessment of	Assessment of the	GEF TF	30,000	87,500	117,500
institutional	capacity of different				
coordination	stakeholder groups;				
requirements and for	The mean ancibility of				
stakeholder participation for uptake,	The responsibility of each stakeholder for				
support and	project				
mainstreaming	implementation				
biodiversity rich	developed and agreed				
options, and for the	upon;				
FSP implementation	~pon,				
- 22 implementation	Establishment of the				
	full project				
	management and				
	implementation				
	arrangements;				
	ToRs for project				
	management staff,				
	Steering Committee				
	and the Technical				
	Advisory Board;				
	Communication				
	strategy for the FSP;				
	National Training plan				
	National Training plan developed.				
3. Policy and	FPS activities defined	GEF TF	17,500	15,000	32,500
institutional framework	in the area of creating	GEI II	17,500	13,000	32,300
review to identify	ABS and other benefit				
requirements and	sharing mechanisms				
opportunities available	together with an				
for ABS and other	enabling policy				
benefit sharing	environment.				
mechanisms to					
mainstream					
agrobiodiversity into					
agriculture and other					
productive sectors in					
the Eastern Himalayas					
4. Monitoring and	Project Logframe;	GEF TF	20,000	45,000	65,000
evaluation mechanisms					
defined to measure the	Costed project				

performance and	supervision plan;				
impacts FSP	M&E Plan;				
	GEF SO2 Tracking tools				
	10015	(select)			0
		(select)			0
		(select)			0
		(select)			0
		(select)			0
		(select)			0
		(select)			0
		(select)			0
Total Project Preparati	ion Financing		100,000	207,500	307,500

# C. FINANCING PLAN SUMMARY FOR PROJECT PREPARATION GRANT: (\$)

	Project Preparation	Agency Fee
Grant Amount	100,000	10,000
Co-financing	207,500	
Total	307,500	10,000

# **D. PPG** AMOUNT REQUESTED BY AGENCY(IES), FOCAL AREA(S) AND COUNTRY(IES)<sup>1</sup>

Trust			Country Name/		(in \$)	
Fund	GEF Agency	Focal Area	Global	PPG (a)	Agency Fee (b)	$   \begin{array}{c}     \text{Total} \\     c = a + b   \end{array} $
GEF TF	UNEP	Biodiversity	Nepal	100,000	10,000	110,000
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
(select)	(select)	(select)				0
Total PP	G Amount			100,000	10,000	110,000

<sup>&</sup>lt;sup>1</sup> No need to provide information for this table if it is a single focal area, single country and single GEF Agency project.

### E. PPG BUDGET

Cost Items	Total Estimated Person Weeks for Grant (PW)	Grant Amount (\$)	Co-financing (\$)	Total(\$)
Local consultants *	82.00	16,900	48,700	65,600
International consultants*	39.00	34,500	53,250	87,750
Travel		28,000	16,850	44,850
Workshops		15,600	59,700	75,300
Reporting & documentation		5,000	29,000	34,000
expenses				
				0
Total PPG Budget		100,000	207,500	307,500

<sup>\*</sup> Annex A for Consultant cost details should be prepared first before completing this table. See notes on Annex A for the required detailed information. This table is the sum of all local and international consultants presented in Annex A.

Note: TRAVEL: The nature of this proposal involving communities that will adopt different diversity access and use schemes and that involves a number of different institutions and governmental levels calls for consultations to ensure informed commitments to proposed actions prior to implementation of the FSP. GEF resources would be used to cover travel for consultations. Further travel expenses are required for international expertise to provide initial guidance on setting up policy and mainstreaming schemes and for building of an effecting implementation process

#### F. GEF AGENCY(IES) CERTIFICATION

This request has been prepared in accordance with GEF policies and procedures and meets the GEF LDCF/SCCF Trust Fund criteria for project identification and preparation.

Agency Coordinator, Agency Name	Signature	Date (Month, day, year)	Project Contact Person	Telephone	Email Address
GEF Agency Coordinator: Maryam Niamir- Fuller Director, GEF Coordination Office, UNEP	M. Mausull	February 02, 2011	Marieta Sakalian,PhD UNEP Senior Programme Management /Liaison Officer (CGIAR/FAO), Biodiversity	+39 06570 55969	Marieta.Sakalian @unep.org

### Annex A

# **Consultants Financed by the Project Preparation Grant (PPG)**

Type of Consultant	Position / Titles	\$/ Person Week <sup>1</sup>	Estimated PWs <sup>2</sup>	Tasks to be Performed
Local	National Agrobiodiversity Specialists:	800	29.00	Conduct feasibility studies and analyze available information on amount and distribution of agrobiodiversity, conservation and use practices, and actors maintaining diversity to contribute to national planning. Assess institutional capacity for mainstreaming agricultural biodiversity. Collaborate in identification of site selection criteria.
				Further identification and assessment of on-going and proposed projects that would complement the FSP either through providing co-funding or critical baseline interventions;
				Hold consultations with local and national stakeholders to determine interest in and capacities for adoption of these different diversity rich practices;
				Determine actions, costs, and timelines to include in the FSP for adopting selected diversity rich options areas in the FSP and the replication of these to larger areas over time;
				Provide guidance to the consultants collecting information from potential sites to ensure that data includes a) elements essential for defining methodologies for the FSP and b) initial estimations of potential benefits from different sites so as to facilitate the selection of pilot localities for inclusion in the FSP
				Work closely with the national institutional capacity and training analysis specialist and the environmental monitoring and evaluation expert in the final definition of FSP outcomes, outputs and activities, based on a logical

				framework analysis (see tasks under international consultant at end of table) and training and capacity building needs assessment.  Synthesize methods and capacity of participatory breeding programs, which exploit the local diversity to produce cultivars for marginal environments.  Review and characterize on going local and national activities that have enabled farmers to have the diversity
				of quality seeds they need at the time when they need them.
Local	National Ecosystem Services Specialists	800	13.00	Engage in exchanges and consultations with project teams and experts that are developing methodologies measure the impact agricultural biodiversity on ecosystem services;  Work in conjunction with national experts and government staff to define how these methodologies could be applied in the Eastern Himalayan context in the FSP;
				Based on this determine data collection methodology, determine costs, timelines to include in the FSP for ecosystem service measurements derived from maintaining agricultural biodiversity
Local	National Policy and Legal Specialists	800	12.00	Characterization and ranking of incentives and tools that impede or support maximising conservation benefits from the application of existing Government incentives, including ABS and other benefit sharing mechanisms. This should include both policy and operational constraints;  • Formulated plans for analysis of the principal policy, regulations and institutions that constraint for the adoption diversity rich options for sustainable agriculture, and create guidelines for potential actions to address these to facilitate broader application in the long-term;
Local	National Hill Crops And Associated Fruit Tree And Pasture, Integrated	800	18.00	Working in conjunction with local and national government staff to review available information on the interaction of pasture, fruit trees and

	M 4 1	1	1	1 1
Local	Management And Economics Experts  Participatory Diagnostics Specialists	800	10.00	crop land use in pre-selected pilot areas and the relative contribution of biodiversity to the agricultural production system of each sector.  Conduct and initial economic assessment to define magnitudes of opportunity costs associated with inputs from different sectors of the household farming system.  Together with the Agriculture Biodiversity Specialists and Experts, liaise with biodiversity, grasslands and environmental policy experts to provide criteria for selecting mainstreaming diversity rich options to be included in the FSP within in the different mixed mountain crop-livestock ecosystems, and the set of actions that would be required to: a) finalise portfolios of choices; b) monitor the adoption of these throughout the FSP  Work with the monitoring expert to provide input for land-use related indicators in logical framework and provide inputs to relevant sections of the FSP Product  Working in conjunction with government and non-government staff assigned to the PPG, review the capacity of national partners in implementing participatory approaches to diagnostics, and project implementation activities.  Provide expertise to support and facilitate the process of developing protocols for participatory diagnosis for monitoring information and participation of local communities
				approaches to diagnostics, and project implementation activities.  Provide expertise to support and facilitate the process of developing protocols for participatory diagnosis
				Provide a review of existing participatory approaches training materials within the country.  Identify national institutions and
	Di li	20.50	10.00	experts in participatory approaches and prepare a roster of persons and expertise.
International	Biodiversity Expert With Experience Working In Mountain Environments	2250	19.00	The project will increase the capacities of a wide range of local and national stakeholders to mainstream the use of biodiversity rich approaches

to manage unpredictable change in the environment to ensure sustainable agriculture at different levels and to generate a range of different environmental benefits. Thus project components will need to be carefully constructed to define the mix of policy level and pilot work to reflect these different realities and facilitate the development of a framework built from an understanding of local and national conditions. Project development will require information. action from different stakeholders with distinct understandings of the access, use and improvement of local agricultural biodiversity and close consultation between all to ensure feasible and targeted components. While national staff from a range of institutions will provide guidance and overall coordination, a specialist with expertise in projects and environmental policies/governance, particularly in the context of mountain environments, will be hired to:

Lead the process of of analysis, systematization and validation of findings and proposed project components and ensure that these can be objectively verified through a set of indicators that are acceptable to the wide variety of project partners in each country.

Provide methodological orientation to different consultants (see above and below) to ensure a harmonised approach to information collection, analysis and consultation across themes, regions and stakeholders.

Coordinate consultations with local communities and national stakeholders and determine actions, costs, and timelines to include in the FSP for adopting selected diversity rich options areas across countries in the FSP and the replication of these to larger areas over time;

Ensure that the project is linked into other national regional and global GEF and other initiatives in the areas of Biodiversity, Land Degradation and

				Climate Change, and that Outputs within the project Logframe can be
				further mainstreamed into other international and regional initiatives.
				Ensure the harmonization of elements essential for defining methodologies for the FSP and b) initial estimations of potential benefits from different sites so as to facilitate the selection of pilot localities for inclusion in the FSP
				Work closely with the national institutional capacity and training analysis specialist, the participatory diagnostic specialists and the environmental monitoring and evaluation expert to produce the final definition of FSP outcomes, outputs and activities
				Coordinate and implement with national partners the logical framework workshop to ensure that project analysis and proposed components and actions capture GEF biodiversity eligibility requirements and that proposed interventions and indicators are appropriate.
				Ensure that the project document fully and reflects the training and capacity needs for the FSP.
International	Legal And Policy Analysis With Particular Expertise In Biodiversity And Benefit Sharing Mechanisms	2250	12.00	Provide guidance to PPG consultants and Government staff on ABS and other benefit sharing schemes and the actions required in the FSP. This would include reviewing inputs from the technical assessments undertaken in the PPG and making recommendations for designing pilot approaches for testing ABS and other benefit sharing mechanisms, contractual models, PIC, and frameworks required for monitoring the delivery of services.
International	Environmental Monitoring And Evaluation Expert	2250	8.00	The high level specialist in environmental and project M&E would provide support to the Agricultural Biodiversity Expert to other PPG consultants and national governmental staff at key moments in the project design phase to prepare the M&E plans. This support includes;
				Guidance on the description of global,

	national and local benefits derived from different project components and the contribution of different funding sources to each based on incremental cost assessment.
	Overall orientation to the PPG consultants and the consultation group in relation to GEF principles and information requirements particularly as regards incremental costs.
	Detailed formulation of incremental cost matrices and the review of the strategic workplan and cost efficiency analysis and develop the detailed financial plan for the project and supervise project budget implementation and monitoring.
<sup>1</sup> Provide dollar amount per person w	Develop key site and country-specific indicators and monitoring strategy for the FSP, formulate the project M&E plan and budget, and complete the project tracking tools.

<sup>&</sup>lt;sup>1</sup> Provide dollar amount per person week.
<sup>2</sup> Provide person weeks needed to carry out the task