

CHAPTER 4 PLANNING QUICK IMPACT PROJECTS

4.1 Formulation of Quick Impact Projects (QIPs) for the Target Area

4.1.1 Definition and Types of QIPs

Quick Impact Projects are defined as projects that will produce visible impacts/outcomes in the short-term,¹ for which impacts and outcomes include improved productivity and increased income of beneficiaries, introduction and promotion of improved agriculture technologies such as quality seed, fertilizers, agriculture machinery, and post-harvest technologies, and the construction or rehabilitation of rural infrastructure related to agriculture development. It is expected that QIPs will showcase the potential for agriculture development in the Nacala Corridor, which will attract donors to finance the projects proposed in the Master Plan, and attract local and foreign companies to invest in agriculture and agribusiness projects in the Nacala Corridor. In addition, QIPs will also be formulated to kick-start preparatory activities for cluster development at the specific localities proposed in Chapter 2.3.

(1) QIPs to be carried out through public funding (Public Sector Projects)

As discussed in Section 3.1.3, the priority projects were selected from the list of master plan component projects, taking into consideration conformity with the development strategy of Phase I of the master plan implementation, the impacts on the regional economy, and the necessity for initiating cluster development in designated areas. Potential QIPs were identified from priority projects in view of the definition for QIPs, as explained above, and the specific criteria discussed in the following section. The QIPs selected from the master plan components will be carried out through public funding due to the nature of those projects, which aim to facilitate agriculture development for local farmers.

(2) QIPs to be carried out as private investment by agribusiness companies (Private Sector Projects)

Although the potential QIPs will be chosen from priority projects proposed in the Master Plan, on-going or planned private initiatives for commercial agriculture/agribusiness investments will be identified as QIP candidates. Those projects are expected to generate impacts on the local economy in the short-term since the foundation of their business operations would have already been established through ongoing private initiatives. Potential private initiatives applicable to QIPs are the agro-processing industry, poultry industry, corporate farms for crop production together with contract-farming arrangements with local farmers, and other agribusiness investments operated or planned in the Nacala Corridor.

¹ It is expected that the QIPs will be completed within 3 years. However, the project period for some QIPs relating to cluster development will be extended to 6 years.

4.1.2 Selection Criteria for QIPs

Even though QIPs will be selected from the list of priority projects as well as on-going private initiatives, there may be projects that will seek to achieve institutional reforms or extensive agricultural infrastructural development, from which a visible direct impact would not be produced in the short-term. Based on the definition of QIP, those projects would not be regarded as QIPs. Taking into consideration these points, the principle criteria for selecting QIPs are set out in Table 4.1.1. Two specific criteria are set for the selection of QIPs in private investments, taking into account the availability of potential financing to start up the project as well as consideration for applying an inclusive approach for the involvement of local farmers in production as business partners. Figure 4.1.1 illustrates the overall procedures for the identification of QIPs.

Table 4.1.1 Selection Criteria for the QIPs

No.	Criteria
1	Producing visible and attractive impacts in the short-term (1~6 years)
2	Simplicity in the formation of the project implementation structure (can easily and quickly be carried out without extensive preparatory work)
3	Level of impact on achieving the development goal in conformity with the zonal development strategy
4	Level of impact on achieving the development goal in conformity with the cluster development strategy
5	Showcases the potential of agriculture/agribusiness development in the Nacala Corridor
6	Availability of financial options for implementing the project (especially for private investments)
7	Level of involvement of small-scale farmers (i.e. introduction of a contract-farming approach in production, especially for private investments)

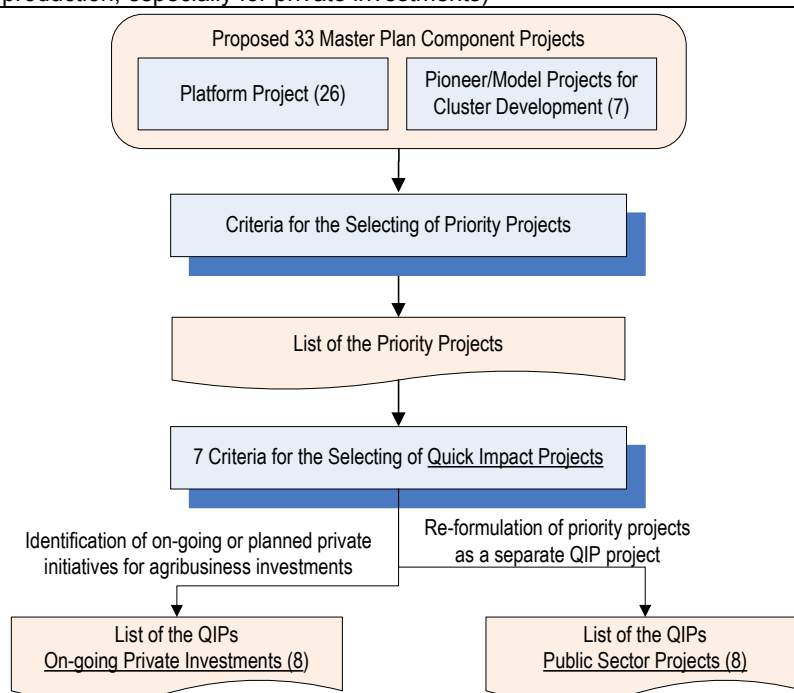


Figure 4.1.1 Procedures for the Selection of the QIPs

4.1.3 Formulation of QIPs

(1) Formulation of QIPs from master plan components (Public Sector Projects)

Following the selection criteria for QIPs presented in Table 4.1.1, priority projects of the Master Plan are further examined to nominate candidates for QIPs, and then re-formulated as separate QIP projects, as listed in Table 4.1.2, in consideration of the implementation framework and activity schedule, which could enable them to generate specific visible impacts in the short-term. The potential target sites and beneficiary groups for QIPs are identified according to the zonal and cluster development strategy as well as through a series of consultations with government counterparts at the provincial and district levels.

Detailed project information on each QIP is summarized in the separate Project Information Sheet, attached to the following page, including: i) a summary of the project; ii) the project site and target groups/beneficiaries; iii) the main outputs (products or services); iv) an activity schedule and its implementation structure; v) estimated project costs; and vi) the expected impacts or benefits for the target groups as well as local economy/communities. In addition, the results of the pre-screening for environmental and social aspects are presented in each sheet in view of the application of the strategic environmental assessment.

Table 4.1.2 List of the QIPs (Public Sector Project)

No.	Project Name	Project Site	Zone
1	Land registration for small scale and medium scale farmers	- Meplacha and Macoropa in Cuamba - Chimbonila in Lichinga District - Nintulo in Gurue District - Luelele in Mandimba District	V VI V V
2	Road improvements for marketing	- Gurue and Ngauma Districts	V
3	Promotion of quality seed production at the regional level	- IIAM North East Centre in Nampula (venue of the training) - Seed farms of the leading local seed growers (seed production site)	III V VI
4	Promotion of vegetable production with small pumps	- i) Monapo, ii) Meconta, iii) Ribaue or Malema and iv) Mandimba	I/II/ III/V
5	Renewal of cashew trees	- Meconta, Monapo, Muecate, Nampula	I/II
6	Planning of land reserves for medium and large scale investment	- Iapala, Ribaue District	III
7	Model project for family food production cluster development	- Malema District	III
8	Development of agriculture special economic zone (SEZ)	- Cuamba District	V

(2) Identification of QIPs from On-going and Planned Private Initiatives (Private Sector Projects)

As explained in Chapter 4.1.1, on-going or planned commercial agriculture/agribusiness investments by existing private companies in the Nacala Corridor are also considered candidates for QIPs. Through interviews with several agribusinesses as well as the revisiting of the proposals submitted to the ProSAVANA Development Initiative Fund in October 2012, a number of specific fast-track business opportunities have been identified, each one of it could be initiated in the next few years if affordable financing is available. The proposed

projects could be operated on a commercially sustainable basis with significant benefits for local farmers as well as the local economy since most projects plan to adopt contract-farming arrangements with small-scale farmers in the production of crops. Table 4.1.3 summarizes the identified QIPs to be carried out through private investment. Detailed information for each project is presented in the Project Information Sheet attached to the following pages, while a summary and evaluation of the business models of the proposed QIPs by private businesses is compiled in Table 4.1.4.

Table 4.1.3 List of the QIPs (Private Sector Projects)

No.	Project Name	Project Site	Zone
1	The expansion of poultry business	- Lichinga	VI
2	Promotion of the out-grower scheme for soybean production	- Lichinga	VI
3	Development of a cassava processing factory and promotion of contract-farming with small-scale farmers for the production of cassava and other crops	- Lioma Plain (either in Malema, Cuamba or Gurue districts).	III/V
4	Promotion of an out-grower scheme for soybean production	- Lioma, Gurue District	V
5	Promotion of seed production by out-growers under contract-farming arrangements	- Ribaue District - Mecubri Districts	III I
6	Tea industry revitalization project: promotion of the out-grower model for tea production	- Gurue District	IV
7	Promotion of contract-farming for crop production with smallholders	- Meconta (Namialo) District - Ribaue (Iapala) District	II III
8	Establishment of the mill for poultry feed and flour production (by the Cooperative)	- Cuamba District	V

1. QIP (Public Sector Projects)

Quick Impact Project (Public Funding)

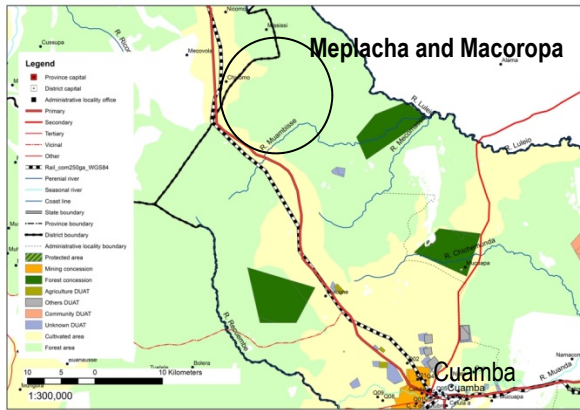
Project Title: (1) Land Registration of the Small Scale and Medium Scale Farmers	
1. Project Site	<p>Selecting 4 locations in 4 districts from the following 2 criteria (20,000 ha in total)</p> <ul style="list-style-type: none"> - Around Meplacha and Macoropa in Cuamba, and Chimbonila in Lichinga for mitigating land conflicts among farmers (The area of each site is supposed to be 5,000 ha) - Nintulo in Gurue and Luelele in Mandimba for mitigating land conflicts between farmers and investors (The area of each site will be around 5,000 ha) <p>The area of each project site is decided by the experience of MCA project and preparatory survey of the project.</p>
2. Target Group/Beneficiaries	<ul style="list-style-type: none"> - Small and medium scale farmers who want to apply DUAT in the target area
3. Project Summary	<p>Registration of the land title (DUAT) to small and medium scale farmers for the following purposes.</p> <ul style="list-style-type: none"> - Mitigate the insecurity and fragility of small farm (small scale farmer) and ensure the right related to the use of the land and possession of the properties on the land. - Promote intensive cultivation to small scale farmers. - Facilitate the identification of areas for the promotion of agriculture by large farmers, private companies and medium scale farmers with leading experience (initial phase of the transition to an intensive agriculture)
4. Justification (Conformity with the zoning/cluster development strategy, etc.)	<ul style="list-style-type: none"> - The purpose of the project conforms of the policy of phase I expanding fixed cultivation. - The project contributes to mitigate land confliction between farmers and investors and among farmers themselves. - The project for the registration of DUAT to small and medium scale farmers has been implemented by MCA until August 2013. This QIP is expected to be implemented smoothly by using knowhow and human resource accumulated through the MCA project.
5. Implementation Structure (Partners, Project implementation arrangement, Staffing, etc.)	<ul style="list-style-type: none"> - Donor: 1 project manager - Counterpart agencies: SPGC in each DPA, SDAE of the target area - Partners: DNTF (Central Government), MCA and its consultant companies, FAO - Implementation arrangement: The preparatory survey is implemented by a project manager and local consultants with participation of SPGC of each province. Registration of land title is implemented by the local consultants in each province. The project manager supervises the progress of the project and has the responsibility of the outcomes. SPGC of each province is involved well throughout of the process.
6. Main Products or Services	<ul style="list-style-type: none"> - Registration of land title (DUAT) to small and medium scale farmers in the target area. - Compiling methodologies, strengthen the implementation bodies to provide DUAT for small and medium scale farmers.
7. Project Activities	<ol style="list-style-type: none"> 1. Preparatory survey and planning <ol style="list-style-type: none"> 1-1. Review of the relevant information (Outcomes of PD (Database of DUAT and master plan), PDUT, Land tenure activities by Millennium Challenge Account, etc.) 1-2. Consultation with DNTF and relevant donors (MCA, FAO, etc.) 1-3. Preparatory field survey to the target area 1-4. Making activity plan

	<p>2. Provision of land title (DUAT)</p> <p>2-1. Making inventory and distribution map of land users (ProSAVANA-PD prepared the land cover and land use map with concession and DUAT information based on the map and information by DNTF and CENACARTA)</p> <p>2-2. Community consultations, formation processes and consolidation of each DUAT</p> <p>2-3. Support for application of DUAT by farmers</p> <p>3. Strengthening the implementation bodies</p> <p>3-1 Providing necessary software and tools for the activities</p> <p>3-2. Update the know-how of registration of DUAT (making a kind of manual)</p> <p>3-3. Strengthening the implementation bodies (SPGC of each DPA)</p>
8. Project Cost	<p>Total Project Cost (MT) : 13,248,900 MT</p> <p>1) Operational cost (salaries, consumables, contract with partner organization, etc.): 12,618,000 MT</p> <p>2) Other cost: 630,900 MT</p>
9. 1) Expected Impacts or Benefits 2) Indicators	<p>1) Expected impacts: Dissemination of intensive cultivation to small and medium scale farmers</p> <p>2) Indicators</p> <ul style="list-style-type: none"> - Registration of DUAT to all of the small and medium scale farmers who want to apply in the target area - Updated know-how of registration of DUAT - The know-how is accumulated in SPGC of each DPA.
10. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: Yes - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
11. Other Information (Preconditions such as required public infrastructure, etc.)	<ul style="list-style-type: none"> - The registration of land title project for small and medium scale farmers funded by MCA will be terminated in August 2013. - DNTF is proposing FAO to succeed the project from MCA. MCA also has an idea that they keep on implementing the project, if they success to gain the budget. - Fixed cultivation model is demonstrated through PR8 (Model project for development of leading farmers) - (As the reference information) The MCA consultant takes two months to provide DUAT to 627 farmers in 1300 ha (the whole process from making inventory of local farmers to the completion of the DUAT application (DUAT approved by the government))

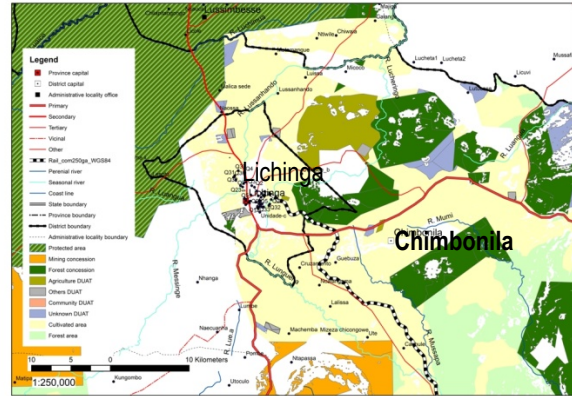
12. Project Implementation Plan (Plan of Operation)

- The first year: Preparatory survey (for 2 months)
- The second and third year: Registration of land title at 4 locations
- Strengthening the implementation bodies will be implemented in three years.

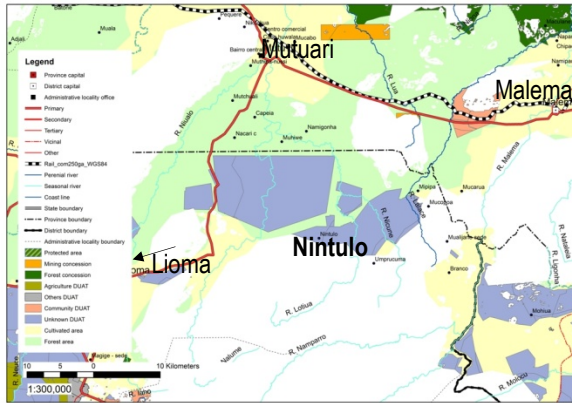
13. Map of the project site



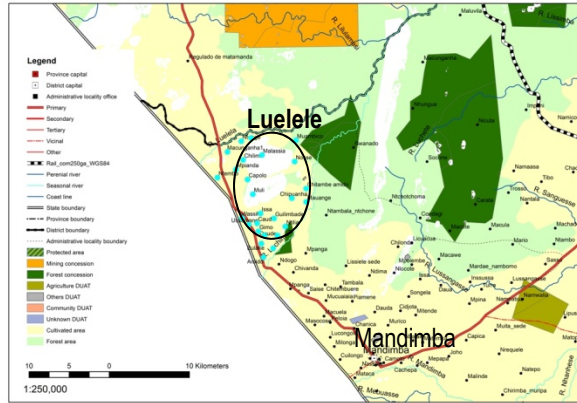
Meplacha and Macoropa



Chimbonila



Nintulo



Luelele

Quick Impact Project (Public Funding)

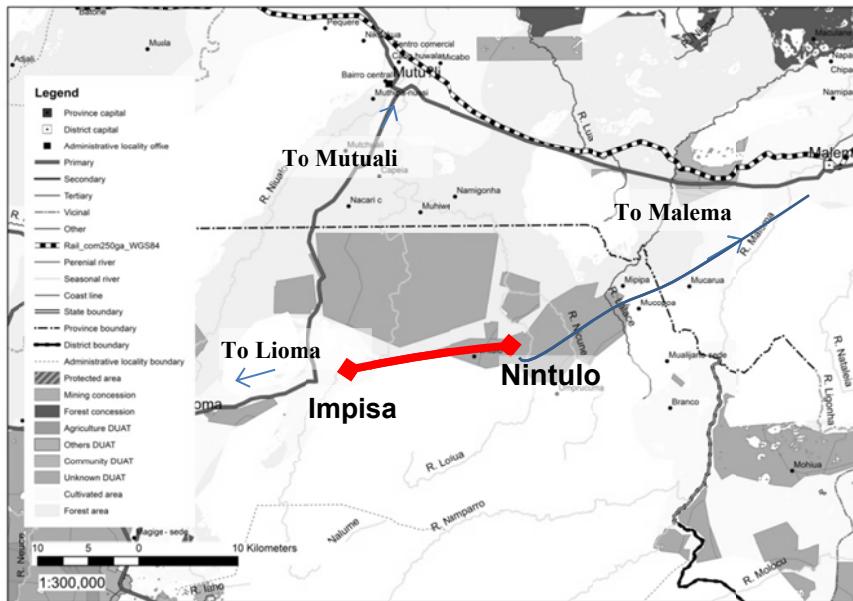
Project Title : (2) Road Improvement for Marketing	
1. Project Site	<ul style="list-style-type: none"> - Gurue district, Impisa to Nintulo (19km) - N'Guama districts, Matamanba to Total (17km)
2. Target Group/Beneficiaries	<ul style="list-style-type: none"> - Direct Beneficiary : Farmers in remote area - Beneficiary : Rural habitant live in the area
3. Project Summary	<ul style="list-style-type: none"> - Road connected to market will be improved aiming to increase income of farmers. The project site is an agricultural production area with high potential but not used efficiently due to lack of good market access. By the improvement of road, local inhabitants will also get good access to social service and raise their quality of life.
4. Justification (Conformity with the zoning/cluster development strategy, etc.)	<ul style="list-style-type: none"> - The aim of the project is conforming to the strategy for vegetable production as making good income for farmer. - The project is corresponded to priority for road improvement strategy such as road to increase market access.
5. Implementation Structure (Partners, Project implementation arrangement, Staffing, etc.)	<ul style="list-style-type: none"> - Coordination Body : DPA - Implementation Unit: SDAE + NGO (farmers involvement and evaluation survey) - Support Structure : ANE (road design and supervise)
6. Main Products or Services	<ul style="list-style-type: none"> - Road Improvement of 36 km - Increasing of Farmer's income.
7. Project Activities	<ul style="list-style-type: none"> - To construct the paved road (36 km) to high agricultural production sites. - To organize several workshop (W/S) to involve farmers in development <ul style="list-style-type: none"> +1st W/S to disseminate outline of road construction work and its purpose. +2nd W/S to discuss how to participate and contribute the construction works. +3rd W/S to prepare PO to use the road effectively in order to improve their income. (Marketing, mass transporting, change of crop. etc) + 4th W/S to monitor the activities. + 5th W/S to evaluate own activity by themselves. - To conduct baseline and evaluation survey for impact estimation.
8. Project Cost	<p>Total Project Cost (MT) : 16,415,400 MT</p> <ol style="list-style-type: none"> 1) Construction, equipment and material cost: 15,174,900 MT 2) Operational cost (salaries, consumables, contract with partner organization, etc.): 1,240,500 MT 3) Other cost
9. 1) Expected Impacts or Benefits 2) Indicators	<ul style="list-style-type: none"> - Increasing farmer's income by reducing cost for hauling, post harvesting and purchasing the material, increasing selling price and type of crops with good market appeal.
10. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: A (Need for EIA: Full environmental impact study) - Mitigation measures: Route planning, Road structural design, Work methods, Awareness campaign - Recommendations for monitoring and/or compensation: Yes
11. Other Information (Preconditions such as required public infrastructure, etc.)	<ul style="list-style-type: none"> -

12. Project Implementation Plan (Plan of Operation)

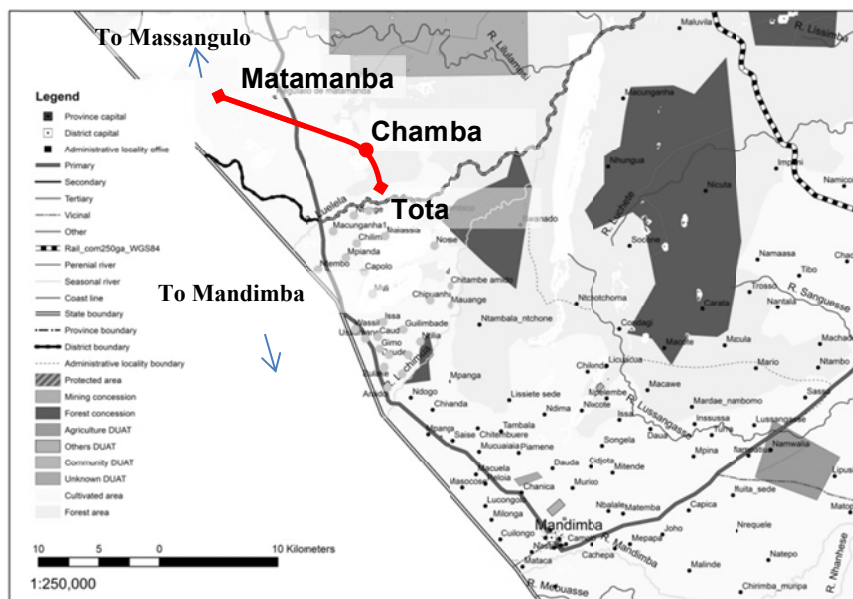
No	Project Activity	2014	2015	2016
1	Preparation of the design	■		
2	Tender for construction works		■	
3	Construction Works		■	
4	Farmers Workshops	■	■	■
5	Monitoring & Evaluation (baseline survey and		■	■

13. Map of the project site

1. Gurue : Impisa to Nintulo (19km)



2. N'Gauma: Matamanba to Tota (17km)



Quick Impact Project (Public Funding)

Project Title: (3) Promotion of quality seed production at the regional level									
1. Project Site	<ul style="list-style-type: none"> - IIAM North East Centre in Nampula (training) - Seed farms of local seed growers mainly in Zone III, V and VI (seed production) 								
2. Target Group/Beneficiaries	<ul style="list-style-type: none"> - Direct beneficiaries: Local seed growers who have a certain experience in seed business. - Indirect beneficiaries: General farmers 								
3. Project Summary	<ul style="list-style-type: none"> - Only a few farmers use quality seeds in Mozambique, as well as in the ProSAVANA area. They usually use own produced seeds or exchanged/purchased seeds from neighbors. In order to improve accessibility of quality seeds with affordable price to farmers, local seed growers shall be empowered to produce them. 								
4. Justification (Conformity with the zoning/cluster development strategy, etc.)	<ul style="list-style-type: none"> - There are several seed growers started their business at provincial/district level in recent years. They don't get a systematic support to address the following problems for running their business. <ul style="list-style-type: none"> (1) Lack of reliable basic seeds (2) Lack of technical staff to manage quality seeds production (3) Lack of fund (capital & operation) - This project shall contribute to increase quality seeds marketed at affordable price to farmers through empowerment of the seed growers. 								
5. Implementation Structure (Partners, Project implementation arrangement, Staffing, etc.)	<ul style="list-style-type: none"> - IIAM North East Centre in Nampula (training and provision of basic seeds) - SDAEs (providing supporting services to seed growers and their out-growers) - Local seed growers and their out-growers (seed production) 								
6. Main Products or Services	<ul style="list-style-type: none"> - Seeds (maize and beans/pulses) 								
7. Project Activities	<ul style="list-style-type: none"> - To train technical staff of leading local seed growers and extension workers in SDAE - To make priority distribution of basic seed at reasonable cost to seed growers whose technical staff participated in the training - To introduce the seed growers an available credit scheme to organize farmer's groups as out-growers - To provide technical support to out-growers 								
8. Project Cost	<p>Total Project Cost (MT) :</p> <table style="margin-left: 20px; border-collapse: collapse;"> <tr> <td style="padding-left: 20px;">(1) Training fee (trainers & supporting staff):</td> <td style="text-align: right;">746,400</td> </tr> <tr> <td style="padding-left: 20px;">(2) Training materials & inputs :</td> <td style="text-align: right;">499,700</td> </tr> <tr> <td style="padding-left: 20px;">(3) <u>Other cost: (Fuel & Basic seeds):</u></td> <td style="text-align: right;"><u>918,000</u></td> </tr> <tr> <td style="padding-left: 40px;">Total costs:</td> <td style="text-align: right;">2,164,100</td> </tr> </table>	(1) Training fee (trainers & supporting staff):	746,400	(2) Training materials & inputs :	499,700	(3) <u>Other cost: (Fuel & Basic seeds):</u>	<u>918,000</u>	Total costs:	2,164,100
(1) Training fee (trainers & supporting staff):	746,400								
(2) Training materials & inputs :	499,700								
(3) <u>Other cost: (Fuel & Basic seeds):</u>	<u>918,000</u>								
Total costs:	2,164,100								
9. 1) Expected Impacts or Benefits 2) Indicators	<ul style="list-style-type: none"> - Expected impacts Increased volume of marketed quality seeds produced by seed growers whose technical staff participated in the training - Indicators <ul style="list-style-type: none"> (1) Volume of seeds produced by the seed growers (2) Percentage of quality seeds in the total produced seeds 								
10. Environmental and Social Consideration	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: Yes - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None 								

11. Other Information

(Preconditions such as required public infrastructure, etc.)

- ProSAVANA-PI has a research strategy to improve a basic seed production system of IIAM North East Centre in Nampula.

12. Project Implementation Plan (Plan of Operation)

No	Project Activity	2014	2015	2016
1	Preparation of the training	████████		
2	Selection of trainees (technical staff of leading local seed growers and respective SDAE extension workers)	████		
3	Training (15 trainees, 3 days x 4 times)		██	
4	Production of seeds by seed growers			████████

Quick Impact Project (Public Funding)

Project Title: (4) Promotion of Vegetable Production with Small Pump	
1. Project Site	- Target district will be set for Zone I, II, III and VI. Project site and target group will be selected in each target district. The candidate target districts are Monapo (Zone I), Meconta (Zone II), Ribaue or Malema (Zone III) and Mandimba (Zone VI).
2. Target Group/Beneficiaries	- Association or Producers' group who cultivating vegetables, New entrant of irrigation farming is also expected as a member of association/group.
3. Project Summary	- In order to promote vegetable production by small scale farmers in the area nearby large consumption market, small pump will be promoted to be introduced by farmers as well as improving cultivation technology through concentrative technical extension of vegetable irrigation. Small pumps will be leased to farmers through association or producer's group and the refinement will be used for increasing pump in the association/producer's group.
4. Justification (Conformity with the zoning/cluster development strategy, etc.)	<ul style="list-style-type: none"> - Promotion of vegetable production with irrigation is classified as a priority activity of Zone I, II, III and VI in the Master Plan. - Manual irrigation using watering cans limits farmers to expand their irrigation plot due to quantity of labor work for watering and difficulty to bring long distance. - Small pump irrigation is considered as a quick and effective measure to expand irrigation area and production of vegetable.
5. Implementation Structure (Partners, Project implementation arrangement, Staffing, etc.)	<ul style="list-style-type: none"> - DPA to coordinate the implementation of the project, to procure necessary equipment by project budget - SDAE to manage leasing pump equipment to farmers, to provide subsidized seeds distribution program, - Local Partners to support management work of SDAE, to carry out field activity such as technical extension and enhancement of association as well as monitoring works.
6. Main Products or Services	- Vegetables
7. Project Activities	<ol style="list-style-type: none"> 1. Selection of target associations/producer's groups <ul style="list-style-type: none"> - <i>Associations/producer's groups interested in participation to the project are required to submit applications which include farming program and repayment program.</i> 2. Support of introducing pump for small scale farmers <ul style="list-style-type: none"> - <i>To dispose pump equipment to SDAE. SDAE/NGO will provide pumps to farmers through association/group. Farmers will repay the expense by 2 years. Recovered expense will be used for purchasing another pump which will be provided to another member of association/group.</i> - <i>There is an option to use a larger pump (4 inch) for shared use with simple canal network instead of using potable pump (2~3 inch) individually or by small group, if target group aspires. In this case, necessary simple canal network will be developed by farmers.</i> - <i>10 pumps and accessories (pipes, joints, etc.) will be disposed to each SDAE. (6 of 3 inch pump and 4 of 4 inch pump tentatively)</i> 3. Enhancement of activity of association <ul style="list-style-type: none"> - <i>To train leaders and members of associations/producer's group on management of organization and corrective activity.</i>

	<p>4. Technical extension on vegetable cultivation and irrigation</p> <ul style="list-style-type: none"> - To train farmers on farm management of vegetable and irrigation technology - To train farmers on operation and maintenance of pump equipment <p>5. Support of marketing activity for association</p> <ul style="list-style-type: none"> - To support associations/producer's group to organize corrective marketing among members as well as connecting market channel
8. Project Cost	<p>Total Project Cost (MT) : 11,200,112 MT (373,337 USD)</p> <p>1) Construction, equipment and material cost</p> <ul style="list-style-type: none"> - Pump and accessories (24 of 3 inch pump and 16 of 4 inch pump including 50m of pipes, joints, etc.) 2,330,080 MT (77,669 USD) <p>2) Operational cost (salaries, consumables, contract with partner organization, etc.)</p> <ul style="list-style-type: none"> - Local partners (1 project manager, 1 project officer, 1 monitoring and evaluation staff, 4 senior field staffs(technician) and 4 field staffs (extension) for 3 years, including transportation cost) 7,851,840 MT (261,728 USD) <p>3) Other cost</p> <ul style="list-style-type: none"> - Contingency cost (10% of total cost) 1,018,192 MT (33,940 USD)
9. 1) Expected Impacts or Benefits 2) Indicators	<p>1) Expected impact</p> <ul style="list-style-type: none"> - Expansion of irrigation farming and increase of vegetable production - Increase of farmer's income <p>2) Indicators</p> <ul style="list-style-type: none"> - Irrigated area of vegetables, Production of vegetables, farmer's income - Recovery of expense of pump equipment
10. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
11. Other Information (Preconditions such as required public infrastructure, etc.)	<p>Agricultural input:</p> <ul style="list-style-type: none"> - Subsidized seed of SDAE is expected to be provided by SDAE-DPA. - Fertilizer and fuel for pump is paid by farmers.

12. Project Implementation Plan (Plan of Operation)

No.	Project Activity	2014	2015	2016
1.	Selection of target associations/producer's group	■		
2.	Support of introducing pump for small scale farmers			
	- Procurement of equipment and disposing to SDAE	■		
	- Lease contract with farmers	■		
	- Distribution of pumps	■		
3.	Enhancement of activity of association			
	- Training on management of organization	■	■	■
4.	Technical extension on vegetable cultivation and irrigation			
	- Training on operation and maintenance of pump equipment and canals	■	■	■
	- Training on vegetable cultivation and irrigation practice	■	■	■
	- Regular visiting for technical extension and monitoring	■	■	■
5.	Support of marketing activity for association			
	- Support to organize corrective marketing	■	■	■
	- Support on marketing activity	■	■	■
*	Cultivation period of vegetables with small pump irrigation	■	■	■

13. Map of the project site



14. Model Analysis and Scenario of Promotion of Vegetable Production with Small Pumps

(1) Farming model of vegetable production with small pumps

According to the field survey and interview to some associations and their members, the following three models were built for analyzing farming model of vegetable production with small pumps.

Table 1 Farming Models for Vegetable Production with Pumps

Model-1: Individual Farm Management (0.5ha)	Model-2: Individual Farm Management (1ha)	Model-3: Corrective Farm Management (6ha)
Association member, managing own vegetable plot individually	Association member, managing own vegetable plot individually	Association which produces vegetable by corrective work
Member of association which producing vegetables (Monapo district), where each member manages his/her own vegetable plot individually while corrective work of procurement of agricultural input and selling of product are organized by association. The association was established in 2011.	Member of association which producing vegetables (Meconta District), where each member manages his/her own vegetable plot individually while corrective work of procurement of agricultural input and selling of product are organized by association. The association was established in 2007.	The association produces vegetables at its farming plot by corrective work. A corrective work of procurement of agricultural input and selling of product are organized by association as well. (Monapo district) The association was established in 2010.
Cultivating 2~3 ha of subsistence crop (cassava and maize) and 0.2ha of cash crop (vegetable) with irrigation.	Cultivating 5~6 ha of subsistence crop (cassava and maize) and 0.4ha of cash crop (vegetable) with irrigation.	Corrective farming by the association covers 2ha of vegetable, 2ha of maize and 1ha of rice. A part from the corrective farming, each member cultivates his/her own farmland individually, 4~6ha in average, and produce cassava, peanuts, beans, sorghum and sesame.
Family labor 2 persons	Family labor 3 persons and employ 2 seasonal workers	The number of members who participate to vegetable production is 21, of which 7 are women members.

Major selling products are tomato, onion, cabbage, cove, carrot, garlic and pepper. Produced vegetable are sold at field to trader or sold at local market of Namialo by them. Transpiration mean is bicycle.	Major selling products are onion, tomato, cabbage, lettuce cove and carrot. Produced vegetable are sold at local market of Namialo as well as contract sales with a health center. Transpiration mean is bicycle.	Major selling products are onion, cabbage, garlic, lettuce. Major part of produced vegetable are sold at field to trader, while some of them are sold at local market of Namialo.
Manual irrigation with catering can is applied to vegetable plot.	Manual irrigation with catering can is applied to vegetable plot.	Manual irrigation with catering can is applied to vegetable plot.
By introducing pump irrigation with 2 inch pump, it is expected to increase vegetable plot from 0.2ha to 0.5ha.	By introducing pump irrigation with 3 inch pump, it is expected to increase vegetable plot from 0.4ha to 1.0ha.	By introducing pump irrigation with one 4 inch pump and one 3 inch pump, it is expected to increase vegetable plot from 2ha to 6ha.
Expected water source is the Monapo river and there is enough water through year.	Expected water source is small river and spring water, which can be used through year. It may be necessary to improve the intake, which can be executed by the association.	Expected water source is small river which can be used through year.
The pump will be used individually and possibly lent to neighboring farmers when the pump is available.	The pump will be used individually and possibly lent to neighboring farmers when the pump is available.	The pump will be used correctively for corrective farm of the association.

(2) Model analysis of vegetable production with small pumps

The cost-benefit calculation was made for vegetable production during the project period based on the Balance Sheet of Promising Crops described in Report on Drawing of Overall Picture of Development Plan (Draft). As a result of analysis, the annual net profit from vegetable production is expected to increase from 31,179MT at present to 195,012MT after project for Model-1, from 62,358MT to 396,117MT for Model-2, and 311,788MT to 2,375,098MT for Model-3. While the increase of net profit, the necessary farming fund for a year is also to increase from 9,632 MT at present to 59,767 MT after project for Model-1, from 19,264MT to 119,534MT for Model-2 and from 96,320 to 717,204MT for Model-3, due to expand of irrigation area and increase of agricultural input. The necessary framing fund shall be kept from the income from former crop season in the farm management, however, it shall be considered that FDD or any other funding scheme will help for initial stage of the introduction and expansion of pump irrigation.

Table 2 Annual net profit from vegetable production of model farmer/association

(MTs for 2 crops)

Years	Present	Project Period			After Project (2017~2023)
		2014	2015	2016	
Model-1: Individual farm management (0.5ha)	31,179	36,879	119,445	179,777	195,012
Model-2: Individual farm management (1ha)	62,358	76,805	260,219	380,882	396,117
Model-3: Corrective farm management (6ha)	311,788	380,175	1,475,250	2,279,673	2,375,098

Table 3 Annual farming fund for vegetable production of model farmer/association

(MTs for 2 crops)

Years	Present	Project Period			After Project (2017~2023)
		2014	2015	2016	
Model-1: Individual farm management (0.5ha)	9,632	16,769	41,837	59,767	59,767
Model-2: Individual farm management (1ha)	19,264	33,539	83,674	119,534	119,534
Model-3: Corrective farm management (6ha)	96,320	167,694	478,136	717,204	717,204

(3) Scenario of Promotion of Vegetable Production with Small Pump Project

Major assumptions for scenario of the Project are set as shown below:

- Taking into account necessary period for selection of target group/association, procurement of equipment and training of farmers, the pump equipment is scheduled to be deployed at site before June and will start to be used for 2nd crop of 2014.
- Participating farmers/associations are to repay the cost of equipment by 2 years after deployment of pump. The repaid fund is to be used for procuring new pump for other participants of same group/association.
- 3" pump is able to cover 2 ha of vegetable plot in maximum (with assumption of 5.5 PS of power, 20 m of vertical drop and 50m of conveyance length). The pump will be used individually, approximately 1 ha per family, and possibly lent to neighboring farmers when the pump is available. Thus, it is assumed to cover 1~2 ha per pump.
- 4" pump is able to cover 4 ha of vegetable plot in maximum (with assumption of 7.5 PS of power, 20 m of vertical drop and 50m of conveyance length). The pump is expected to be used for corrective farming of association.

10 pumps are proposed to deploy at SDAE in each target district and leased to farmers/associations at the beginning of the Project. The number of pump is expected to increase to 15 at the end of project period (2016) and the multiplication of pump is expected to continue after the project period. After 10 years from starting the Project (2023), 50 pumps are expected to be in use, which covers 110~140 ha, in each target district. Direct beneficiaries are expected to be 90 families for individual users as well as 20 corrective irrigation groups, of which beneficiaries are 200 families under the assumption of 10 members for each group. Besides above direct beneficiaries, though establishing model producer's group of vegetable with small pump irrigation, existing and potential vegetable producers in district will receive indirect benefit such as obtaining improved cultivation technique and increasing motivation to vegetable production.

Table 4 Expected number of pumps, irrigation area and direct beneficiaries by district

Year	Project Period			After Project						
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
No. of 3" pump	6	6	9	12	15	18	21	24	27	30
No. of 4" pump	4	4	6	8	10	12	14	16	18	20
Total number of pump	10	10	15	20	25	30	35	40	45	50
Irrigation area in minimum (ha)	22	22	33	44	55	66	77	88	99	110
Irrigation area in maximum (ha)	28	28	42	56	70	84	98	112	126	140
Number of beneficiaries (family)										
Individual use in maximum (including borrowers of pump)	18	18	27	36	45	54	63	72	81	90
Corrective use (number of groups/associations)	4	4	6	8	10	12	14	16	18	20

Quick Impact Project (Public Funding)

Project Title: (5) Renewal of Cashew Trees	
1. Project Site	- Monapo and Muecate Districts (Zone I), Meconta and Nampula District (Zone II)
2. Target Group/Beneficiaries	- Cashew farmer
3. Project Summary	<ul style="list-style-type: none"> - In Mozambique, cashew production recently has been decreased to 1/3 of the peak of 200,000 tons, and only Nampula province has about 40 % of the production share. One of major reasons of production decrease is decreases infection. So, the renewal of infected cashew tree is an urgent issue to recover the cashew production. But, the renewal of tree causes income decrease until new trees start full production. Renewal cost, such as cutting trees, land clearance, transportation of seedlings are is another burden to farmers. In some districts, NGO and private sector support seedling distribution, but it is not permanent activity, and coverage of support is limited. - A purpose of this QIP is to accelerate cashew tree renewal with proper timing in priority areas of Zone I and II.
4. Justification (Conformity with the zoning/cluster development strategy, etc.)	<ul style="list-style-type: none"> - Conform with QIP selection criteria "Promotion of special crops in certain area or zone" - Cashew nuts industry is important industry in Nampula province. - Capacity of IIAM implementing this project has not been confirmed.
5. Implementation Structure (Partners, Project implementation arrangement, Staffing, etc.)	<ul style="list-style-type: none"> - INCAJU has initiative to implement the project. - IIAM provides technical support on inter-cropping. - SDAE supports implementation of the project.
6. Main Products or Services	<ul style="list-style-type: none"> - Cashew tree with inter-cropping model is developed and demonstrated. - Renewal of cashew trees is promoted by the demonstration.
7. Project Activities	<ul style="list-style-type: none"> - To select priority farmer groups. - To train cashew farmers about inter-cropping and maintenance of cashew tree. - To distribute cashew seedling.
8. Project Cost	<p>Total Project Cost (MT) : 5,607,360 MT</p> <ol style="list-style-type: none"> 1) Operational cost: 5,097,600 MT 2) Other cost: 509,760 MT
9. 1) Expected Impacts or Benefits 2) Indicators	<ol style="list-style-type: none"> 1) NPV of 30-year cash flow is estimated as 840,400,000MT. 2) Cashew tree seedlings are distributed in proper timing. Number of distributed cashew trees seedling.
10. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: Yes - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
11. Other Information (Preconditions such as required public infrastructure, etc.)	<ul style="list-style-type: none"> - According to INCAJU PO, 535,000 seedlings (to cover about 500 ha) will be distributed in ProSAVANA PD target area in 2013, and it will continue every year. - GIZ has supported similar activity in 2013 and 2014. - Existing criteria for selection of producer group, and distribution procedure are applied for this project.

12. Project Implementation Plan (Plan of Operation)

	2014												2015												2016												2017												
	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	
1 Formulating an implementation plan																																																	
2 Arrangement of transportation and distribution equipment																																																	
3 Distribution of cashew tree seedlings to the target farmer group																																																	
4 Training and demonstration for disease control																																																	

13. Map of the project site



Quick Impact Project (Public Funding)

Project Title: (6) Planning of Land Reserve for Medium and Large Scale Investment	
1. Project Site	Iapala, Ribaue District (Zone III), (10,000 Ha of land for land reserve)
2. Target Group/Beneficiaries	<ul style="list-style-type: none"> - DPA/SPCG, Provincial Government, SDAE - Interested investors
3. Project Summary	<ul style="list-style-type: none"> - To develop a sustainable land reserve planning of certain areas - indicated as available, as a result of a zoning map made by the Nampula Province SPCG, through: the concept of a basic project to divide the area (500~900 ha); and the development of a data base of land and information. The objective is to assist interested investors and to guide investments in accordance with public policies of the province and the central government
4. Justification (Conformity with the zoning/cluster development strategy, etc.)	<ul style="list-style-type: none"> - Provide basis for a sustainable land reserve planning by companies and/or producers of medium and large scale, in accordance with the zoning of the area suitability - Introduction of technologies, producing a positive impact on the local agriculture; - Ensure a mechanism for large scale production, aimed to guarantee food security; - Provide raw material in quantity and quality for the domestic and international agribusiness; - Promote of a non-shifting cultivation system; - To facilitate and support the establishment of clusters.
5. Implementation Structure (Partners, Project implementation arrangement, Staffing, etc.)	<p>1st year and 2nd year</p> <ul style="list-style-type: none"> - Local partner to delimit available land, considering overlaps demarcation of reserves, forestry and others; - IIAM Laboratory to perform soil studies (classification and definition of the agrarian use); - Local Accredited Consulting to conduct the Environmental Impact Assessment, - Consulting company to create a database with information and available land; to propose dividing the area in accordance with the RAI principles, including permanent preservation areas and road system; <p>3rd year</p> <ul style="list-style-type: none"> - Consulting company to develop a management tool of the sustainable occupation of areas; a mechanism that will be integrated with activities of the Provincial Government /DPA.
6. Main Products or Services	<ul style="list-style-type: none"> - Map of the area available for medium and large scale investments, composed by information on agriculture, soil and climate, and soil/relief suitability; - Data bank of land and information; - Management tool for the sustainable occupation.
7. Project Activities	<p>Fieldwork:</p> <ul style="list-style-type: none"> a) Community consultations, delimitation and subdivision of the areas, and registration of the land title (DUAT) for local farmers living in the land reserve area (it takes 1 month for each 5,000 ha); b) Collection of soil samples for studies (classification and definition of its use for agriculture); <p>- Office Work:</p> <ul style="list-style-type: none"> a) Environmental Impact Assessment of each area;

	<p>b) Preparation of maps of land occupation, harmonizing:</p> <ul style="list-style-type: none"> - Agriculture-soil-climate zoning; - Land use suitability, and - Environmental sustainability. <p>c) Establish a criteria for the subdivision of areas;</p> <p>d) Create a Land and Information Data Bank to support interested investors.</p>
<p>8. Project Cost</p>	<p>Total Project Cost (MT) : 2,400,000 MT (USD 80,000)</p> <p>1) Field work: Local consultant: 600,000 MT (8 months) (USD 20,000)</p> <p>2) Office work: Local consultant: 900,000 MT (1 year) (USD 30,000) GIS expert: 900,000 MT (1 year) (USD 30,000)</p>
<p>9. 1) Expected Impacts or Benefits 2) Indicators</p>	<p>1) Expected impacts and benefits</p> <ul style="list-style-type: none"> - Increase the sustainable and environmentally responsible production; - Increase the number of large and medium size investor in the region; - Consolidate the region as an important agricultural belt of the country; - Accelerate and monitor Investment Projects; - Introduction of intensive (mechanized) agriculture <p>2) Indicators</p> <ul style="list-style-type: none"> - Number of hectares used for agricultural production; - Number of investors x hectares - Planted area x products
<p>10. Environmental and Social Consideration (Summary of EIA pre-screening)</p>	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: B (Need for EIA: Simplified environmental report) - Mitigation measures: Scrutiny of “availability” of lands, Environmental baseline survey at IEE level - Recommendations for monitoring and/or compensation: None
<p>11. Other Information (Preconditions such as required public infrastructure, etc.)</p>	

12. Project Implementation Plan

PR-23 Project of Planning of Occupation Land for Investment Medium and Large Scale			Phase-1: Transitional phase of fixws cultivation							
Related Project	Priority Site		2014	2015	2016	2017	2018	2019	2020	
1. To delimit available land, considering overlaps demarcation of reserves, forestry and others;										
1-1. Community consultations, delimitation and subdivision of the areas	Province of Nampula (Mecuburi, Ribaue, Murrupula, Lalaua, Malema Districts)									
2. To perform soil studies (classification and definition of the agrarian use);										
2-1. Collection of soil samples for studies (classification and definition of its use for agriculture);	Same									
3- To develop the Project of the Planning of Land Occupation										
3-1. Environmental Impact Assessment	Same									
3-2. Preparation of maps of land occupation, harmonizing:	Same									
3-3-1. Agriculture-soil-climate zoning	Same									
3-3-2. Land use suitability	Same									
3-3-3. Environmental sustainability.	Same									
3-3. Establish a criteria for the subdivision of areas	Same									
4. Create a Land and Information Data Bank to support interested investors.										
4-1. Land and Information Data Bank	Same									
5. develop a management tool of the sustainable occupation of areas; a mechanism that will be integrated with activities of the Provincial Government / DPA.										
5-1. Management tool of the sustainable occupation	Same									

13. Map of the project site



Quick Impact Project (Public Funding)

Project title: Model Project for Family Food Production Cluster Development

<p>1. Project Site</p>	<ul style="list-style-type: none"> - Malema district. Areas located close to Cuamba city - Total crop production area: 5,000 ha. - Total area of cassava production: 2,000 ha. - Area of industrial facilities: 20 ha. - In each association about 200 families will be gathered. The goal is to establish 5 associations
<p>2. Target Group/ Beneficiaries</p>	<ul style="list-style-type: none"> - Direct beneficiaries: Family farmers, small rural communities and local population organized into associations of producers, centers, collectives and other associative forms. - Indirect beneficiaries: Families in situation of food and nutritional insecurity
<p>3. Project Summary</p>	<ul style="list-style-type: none"> - In order to improve the living conditions in the District of Malema and promote the development of the region, improvements will be proposed on the conditions of local agricultural activities, with the consequent increase of production and income. The associations that produce food based on family farming will be strengthened and a cassava processing agroindustry will be built that will create jobs and will absorb local manpower and add value to production. In order to achieve that, it will be necessary investors interested to finance the setting of the industry. The Internal Rate of Return is 33.61% and a nine years Payback, if the investor uses 100% of its own capital. - Each producing association should be address about 200 families. - Total crop production area: 5,000 ha. - Area of industrial facilities: 20 ha - The region is located near the town of Cuamba, which offers logistical advantages regarding the distribution of the production and transportation. - The region presents low social and environmental vulnerability, and has excellent conditions to receive a pioneer project which will require the opening of areas. It was verified that the District has good hydric conditions and soil types for the development of irrigated agriculture. - The first year, the Association number 1, is expected to be composed of 50 families, doubling that number in the second year and filling it out completely in the third year. The other associations will be included in the cluster one at a time in the subsequent years. - This initial model considers a work directly with communities of rural family farmers; however it can also benefit resettled families or farmers in search of better opportunities and living conditions. - It will be encouraged the establishment of associations and the registration of producer organizations by means of technical assistance, monitoring and contractual link with companies of the region. - The establishment and strengthening of agricultural associations formed by small farmers increases the bargaining power, access to inputs, machinery and rural credits, enabling the socioeconomic development of those involved through the establishment of a management structure for the development of small-scale agricultural activity. - The relationship between the processing of cassava industry and agricultural producers will be through contract farming, preferably through one or more legal entities (associations).
<p>4. Agricultural technological package</p>	<ul style="list-style-type: none"> - Each family will be responsible for the cultivation of 5 ha, where cassava should be planted to supply the industry. - For the dwelling and common areas of the community, a 2,800 square meters area should be established per family, plus 0.5 ha for cultivation and other independent 0.5 ha of forest. So, each family will be responsible for an area of approximately 6.28 ha, to be assigned via DUAT. The communal areas should receive priority for social infrastructure, such as access to water and sanitary services. - The independent area of 0.5 ha could be used by the producers to cultivate crops of their choice, cash crop or staple food.

	<ul style="list-style-type: none"> - The plan for the first year is to plant cassava inter-cropped with maize, between the rows, and in the subsequent years, other crops should be planted in the rows, while maintaining the cassava; in the second year maize will be substituted by ground nuts, and in the third year the rotation culture would be cotton. - Areas likely to receive irrigation will be intended for the cultivation of vegetables more adapted to the region.
5. Justification	<ul style="list-style-type: none"> - The objective of the cluster establishment is in accordance with the Initiative to improve the productivity of Familiar Agriculture (Smallholder Agriculture) and Associations of Producers. - Projects of the cluster deployment are part of the Strategies to Extinguish the Shifting Agriculture - The project enables the creation of model associations - The cluster will bring development to the region and improve the living conditions of the local population - To combat poverty and promote socio-economic development of small scale farmers through the strengthening of family agriculture, encouraging the formation and structure of associations and ensure food and nutritional security. - To increase security and legal representation of associations
6. Targets for phase I (2014-2020)	<ul style="list-style-type: none"> - Promote the Association of producers and start the cultivation of crops recommended - Start the installation and expansion of cassava agro-processing - Increase cotton production and improve the quality of the product offered - Increase the production of vegetables to be sold in the Zones
7. Targets for phase II (2021-2025)	<ul style="list-style-type: none"> - The production center of cash crops and staple food will be developed - Better development and increase the production of crops - Increase the trade of cash crops
8. Targets for phase III (2026-2030)	<ul style="list-style-type: none"> - The supply of raw materials for the industry and the industrial processing of cassava will be established - Crop production will be stabilized - The Cluster will have its first chain of values developed.
9. Implementation Structure	<ul style="list-style-type: none"> - The cluster's development will depend on a series of actions of the public and private sectors, as well as the partnerships between both: - Private investors for the industry building and establishment of purchase contracts of cassava. - Financial institutions to provide financing for acquisition of machinery and equipment. - Arrangements between public institutions (IIAM, SDAE and others), private and NGOs to provide and/or facilitate the access to inputs (seeds, fertilizers, cuttings and others). - Arrangements between public institutions (IIAM, SDAE and others), private and NGOs to provide extension services and promotion of training of local producers. - Arrangements between public institutions for the provision of basic social infrastructure services.
10. Main Products or Services	<ul style="list-style-type: none"> - Production of flour and cassava starch. - Job creation and increased family income. - Production of foods such as ground-nuts, maize and vegetables - Cotton production - Establishment of producer's associations and strengthening of existing ones - Facilitation of the local production flow
11. Project Activities	<p>1)-organizational System:</p> <ol style="list-style-type: none"> a) Identification and evaluation of existing associations; b) Identification of priority producers to lead the process of forming new associations and/or participation in existing associations; c) definition of practical actions for the strengthening of associations and development of management tools. d) to promote the Association of producing families. e) Training of registered producers for the management of agricultural production; f) Strengthening public systems of rural extension to support in the deployment and development of management structures in the associations, as well as on the

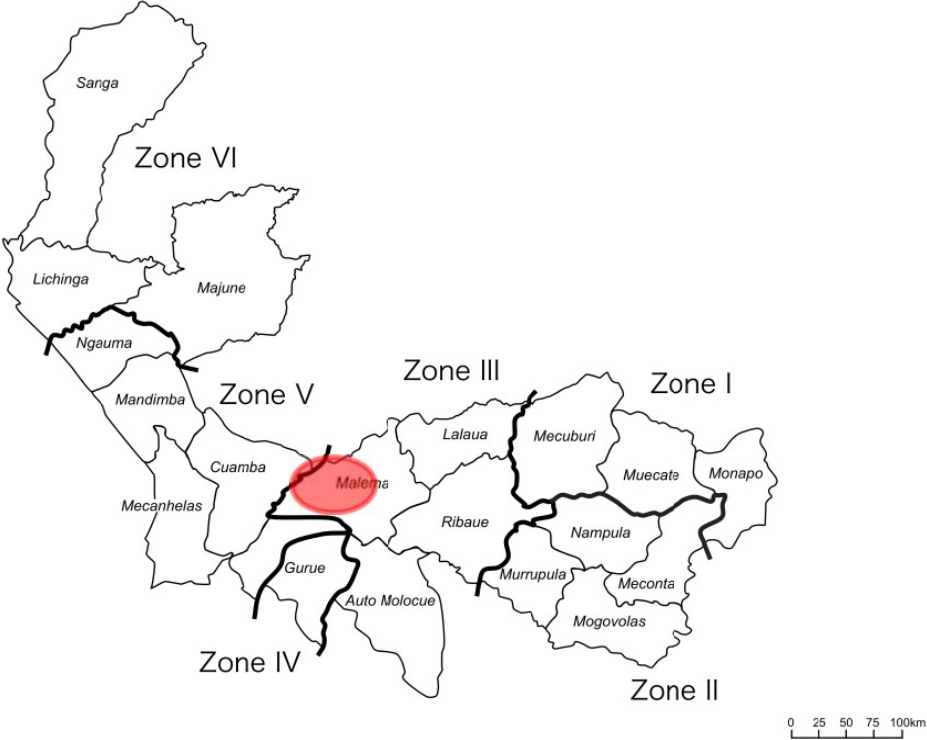
	<p>dissemination and adoption of agricultural production management systems;</p> <p>g) involvement of the private sector for the acquisition of cash crop and surplus of produced food.</p> <p>h) Feasibility of model contracts for purchase and sale of products that include the supply of private extension services and inputs.</p> <p>-Implementation</p> <p>a) the Project must be executed via an institution regularly registered to operate in Mozambique, with experience and proven ability, in partnership with the public assistance systems in order to transfer knowledge;</p> <p>b) the hiring will be in accordance with the rules of the Mozambican Government and any partners involved</p> <p>2) Processing and Marketing:</p> <p>a) To provide training for the industry's manpower.</p> <p>b) Providing inputs for cassava's producers</p> <p>c) Establishment of cassava processing industry</p>
<p>12. Project Cost</p>	<p>Total cost to implement the project:</p> <p>1) <u>Producer's organization, training and capacity building of those involved:</u> \$ 1,166,400 (34,992,000 MT) over 6 years.</p> <p>2) <u>Construction, equipment and materials:</u> the total cost for the installation of the industry is 7,840,500 MT, from this total MT 7,125,000 will be allocated to purchase machines and equipment, and the remaining 712,500 will be for the construction of improvements such as sheds and warehouses. (Investment by a private sector)</p> <p>The cost during the first six years with the purchase of agricultural machinery such as tractors and grids will be 7,795,874 Mt. (Investment by associations)</p> <p>3) <u>Operating cost:</u> the cost of inputs such as fertilizers, pesticides and seeds over six years of cultivation of cassava will be 70,561,471 Mt. (Production costs for 6 years for farmers/ associations)</p> <ul style="list-style-type: none"> - The cost of hand labor for agricultural activities of cassava over six years of cultivation will be 54,578,833 Mt. - The cost of inputs such as fertilizers, pesticides and seeds over six years of cultivation of maize will be 69,322,900 Mt. - The cost of labor for agricultural activities in the culture of maize over six years of cultivation will be of 11,911,458 MT - The cost of inputs such as fertilizers, pesticides and seeds over six years of ground-nut cultivation will be of 41,122,838 MT - The cost of hand labor for agricultural activities of ground nuts over six years of cultivation will be of 22,888,844 MT - The cost of inputs such as fertilizers, pesticides and seeds over six years of cotton cultivation will be of 36,450,319 MT - The cost of hand labor for agricultural activities in cotton culture over six years of cultivation will be of 27,793,597 MT - The operating cost of the industry like manpower, water, energy and materials over six years will be 18,255,262 Mt. <p>4) <u>Total project cost:</u> the total cost of the project over six years will be 374,981,530 MT (US\$ 12,499,384).</p>
<p>13. 1) Expected Impacts or Benefits 2) indicators</p>	<ul style="list-style-type: none"> - Expected impacts: - Combating the practice of shifting agriculture, increase household income, job creation. - Bring development to the region and improve the living conditions of the local population. - Food production for food security - Start the development of the Familiar Production Cluster in Malema - Develop a food producer center in the Nacala region - Through associative systems, improve social relations between families. - Indicators: - Increase the production of cassava flour and starch production. - Increase the production of cotton, ground nuts, maize and vegetables. - Increase family income - Increase the number and the level of development of associations of agricultural

	producers
14. Environmental and Social Considerations (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: A (Need for EIA: Full environmental impact study) - Mitigation measures: Factory engineering design, Fair and lawful farming contract - Recommendations for monitoring and/or compensation: Yes
15. Other Information (Preconditions such as required public infrastructure , etc.)	<ul style="list-style-type: none"> - The machines will be acquired by the producers ' associations and all are responsible for the maintenance and care of the equipment. - Each organization registered in the programme shall be responsible for organizing their associated farmers with and control the quantity and quality of products to be marketed. - The cultivation within the areas will be the responsibility of each family and the remuneration will occur according to the volume of the production delivered. - Cassava processing industry should be able to operate as soon as the first roots start to be collected in the field, 12 months after the first planting. - Monitoring and evaluation of the program shall be carried out by extension workers of the District Services of Economic Activities (SDAE) to ensure its smooth progress and effectiveness. - Models of contracts should be developed, to be used as a commitment between farmers and the Associations' managers, as well as the elaboration of incentives for members to remain in the program, such as: <ul style="list-style-type: none"> ➢ Awards for productivity increase, depending on the accuracy of the production delivery and the correct use of inputs; ➢ Periodical surveys as a way to control and observe the income and quality of the production of each Member; ➢ Elaboration of rules related to the use of inputs and farm management practices, as well as rules about product and ways of marketing, as well as rules of coexistence among involved members; ➢ Organization of courses and field day to improve cultivation techniques;

16. Project Implementation Plan (Plan of Operation)

Project Activity	2014	2015	2016	2017	2018	2019
Organizational phase						
Setting the agro-industry						
Cassava processing						
Implementation of Association 1						
Implementation of Association 2						
Implementation of Association 3						
Implementation of Association 4						
Implementation of Association 5						

17 Map of the project site



Quick Impact Project (Public Funding)

Project title: (8) Development of Agriculture Special Economic Zone

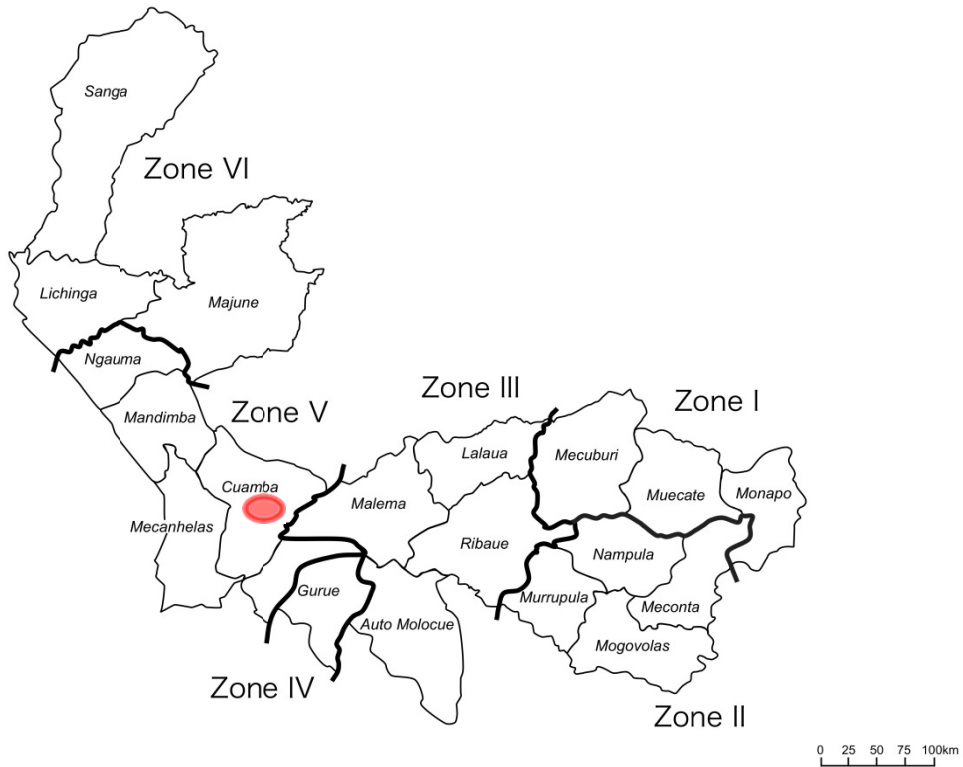
1. Project Site	<ul style="list-style-type: none"> - Cuamba, Niassa, area of the development of the Cluster of Logistic and Agriculture Infrastructure of Cuamba
2. Target Group/ Beneficiaries	<ul style="list-style-type: none"> - Provincial and District Government - Interested investors - Local population - Producers and other parties involved in the agricultural production in the western part of the Nacala corridor
3. Project summary	<ul style="list-style-type: none"> - The Government of Mozambique has the GAZEDA institution with the objective to manage and if necessary to suggest the establishment of a ZEE (Special Economic Zones) and ZFI (Duty-free Zone of Industrialization) in specific locations, in order to create an environment for the efficiency of value chains. - This project aims to formulate studies: to establish areas or units or series of units of industrial activity, geographically delimited and ruled by a specific custom procedure, where the products that are placed there or that passes through there, which will be used to produce goods for export, are exempt from all customs' charges, taxes, parafiscal taxes and can benefit from an specific exchange rate, fiscal and labor system (ZFI); and to establish areas of economic activity, geographically delimited and ruled by a special customs system, where all products that enter there, or are placed there, or passes through there are industrialized or leave the national territory, are entirely free of any customs' charges, taxes and parafiscal taxes, and can also benefit from a free exchange rate system and an "off-shore" exchange system. (ZEE) - The establishment of a zone (500 ha) with such benefits in Cuamba, in order to provide an environment to stimulate the attraction of investments in infrastructure and agricultural development support services.
4. Justification (Compliance with the zoning/cluster development strategy, etc.)	<ul style="list-style-type: none"> - Facilitate and support the establishment of a Cuamba Agricultural Infrastructure Cluster - To establish an specific site with conditions that promotes the efficiency of value chains; - Increase the competitiveness of agricultural production, both for exports and to substitute imports; - Opening of new employment opportunities; - To have a secure trade channel of agricultural products to the agribusiness and services;
5. Implementation Structure (Partners, arrangements for project implementation, personnel, etc.)	<ul style="list-style-type: none"> - Survey of areas (special economic zone) for the suggested Cluster; - To inform and start negotiations with the Government (GAZEDA) on the necessity to establish special areas of the agricultural sector; - To elaborate the Project to Implement a ZEE and ZFI for the Council of Ministers. - Deals for the participation of the private sector regarding the establishment of PPPs (Public Private Partnerships); - Preparation by the Government or by a PPP of the basic infrastructure with the supply of electricity, water, roads and communication by a government institution (including railways); - Providing monitoring services to private companies.
6. Main products or services	<ul style="list-style-type: none"> - Economically favorable areas to implement the strategy of "Clusters" with infrastructure; - Control and regulation of transactions; - Creating a center to provide services and infrastructure for the development of the agriculture in a strategic location within the Nacala corridor
7. Project Activities	<ul style="list-style-type: none"> - Zoning areas (special economic zone) for the Cluster; - To elaborate the Project to Implement a ZEE and ZFI for the Council of Ministers. - To prepare the PPP project and support the Government in the bidding for the operationalization of the zone; - To support the Government on the monitoring of the operation of the zones. - Operationalization of the established Zones

8. Project Cost	<ul style="list-style-type: none"> - Phase of studies and support for the Project to Establish the Special Economic Zone; - Consulting cost of the Project (US \$): 829, 440.00 - Stage of Implementation and Operation of the Special Economic Zone of Cuamba; - Cost of ZEE/IFZ (US): to be defined by the Consulting service <ol style="list-style-type: none"> 1) Improvement of existing infrastructures 2) Strengthening of the tax system 3) Training of technicians 4) Regulation of the commercialization 5) Operating costs (wages, consumable material, GAZEDA's headquarters lease, etc.)
9. 1) Expected Impacts or Benefits 2) Indicators	<ol style="list-style-type: none"> 1) Promote regional development; <ul style="list-style-type: none"> - Implementing the strategy of "Clusters"; - Develop an export market related to agribusiness; - Opening of new jobs; - A well developed agriculture-market-industry link. 2) Indicators <p style="margin-left: 20px;">GDP; export/import; volume of transactions; unemployment index; development of businesses in the region, reduction of cost of production, storage and distribution in agricultural chains.</p>
10. Environmental and Social Considerations (Summary of pre-screening EIA)	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: A (Need for EIA: Full environmental impact study - Mitigation measures: Zone delimitation, Infrastructure planning and design, Awareness campaign - Recommendations for monitoring and/or compensation: Yes
11. Other Information (Preconditions such as public infrastructure required, etc.)	<ul style="list-style-type: none"> - The basic requirements for the installation and operation of a special zone are conditioned to sources of energy and water. - To develop ZEE's in other regions, based on the experience acquired with the first consolidated ZEEs.

12. Project Implementation Plan (Plan of Operation)

Project activities	2014	2015	2016	2017	2018
Consulting phase					
Governmental and regulatory arrangements					
Definition of the area and the Establishment of a Special Zone (Constitution and Benefits)					
Construction and Provision of Basic Infrastructure					
Attraction of Investments to the Special Zone					
Establishment of the Structure of Operation and Monitoring of the Special Zone					

13. Map of the project site



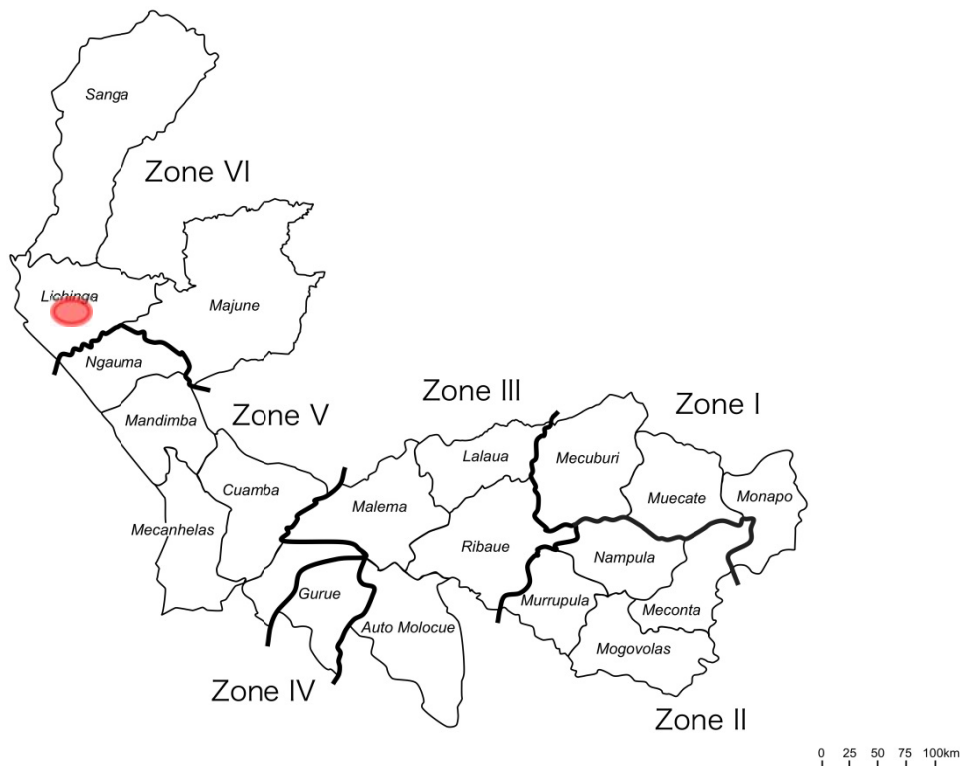
2. QIP (Private Sector Projects)

Quick Impact Project (Private Investment)

Project Title: (1) The Expansion of the Poultry Business	
1. Project Site	- Lichinga District, Niassa Province (Zone VI)
2. Project Summary	<ul style="list-style-type: none"> - The company has produced and sold broiler chickens within the local market in Lichinga. In order to expand the poultry business, the company has invested in the constructing of new broiler sheds and a hatchery installed within their feed mill with the aim of upgrading the broiler production system, and establishing a chick and feed processing unit, the products of which will be sold to other small-scale broiler producers in Niassa province and the surrounding area. In addition, the company plans to expand with a macadamia nut farm in order to diversify their business, which will create additional cash flow. - The company is in the process of obtaining 1,000~1,500 Ha of land to grow soybeans for feed production for its own use. Concerning the increased production of soybeans, the company plans to construct a soybean warehouse and drying facility on the newly acquired land. - The company also plans to develop 400 Ha of land for a macadamia nut plantation on the new land.
3. Justification (Market promotion, comparative advantage, etc.)	<ul style="list-style-type: none"> - The domestic demand for chicken meat is expected to more than triple over the next 10 years, creating opportunities for local poultry industries to supply this demand. - It is necessary to develop vertically integrated production systems for the poultry industry from feed production, breeding, and broiler production to the marketing of products. - Macadamia nuts have a promising market in South Africa. - This integrated production system and the diversification of the poultry business will create more job opportunities for the local population.
4. Project Partners	- Local farmers for soybean production.
5. Main Products or Services	<ul style="list-style-type: none"> - Soybean for chicken feed: 1,500 tons per year (extra soybean will be sold on the commercial market); - Broiler chicken: 24,000~30,000 broilers per month; - Chicks: 25,000~40,000 chicks per month; - Macadamia nuts: 1,000 tons by 2022 (1,600 tons by 2025 with full production).
6. Project Schedule	<p>(On the new farm land)</p> <ul style="list-style-type: none"> - 2013: 1) Registration of the new farm land (acquiring of DUAT) for the production of soybean and macadamia nuts; 2) Clearing of 300 Ha of land for soybean production; and 3) Establishment of nursery for producing macadamia nut tree seedlings; 4) Construction of a warehouse for soybean. - 2014: 1) Clearing of the remaining land for the production of soybean and macadamia nuts; and 2) Installation of a soybean drying facility. - 2015~: Continuation of soybean and macadamia nut production at the farm. <p>(On the broiler farm)</p> <ul style="list-style-type: none"> - 2013: 1) Expansion of the broiler sheds and hatchery; 2) Construction of the breeder chicken sheds; and 3) Installation of a feed mill. - 2014~: Expanding of broilers and chick production.
7. Financial Requirements	<ul style="list-style-type: none"> - Clearing of a new farm land (1,000~1,500 Ha) and planting of macadamia nut trees (400 Ha): USD 720,000 - Construction of the broiler sheds and drying facility: USD 400,000 - Procurement of farm equipment and operating costs : USD 180,000 - Procurement of a steam generator and installation costs: USD 180,000 <ul style="list-style-type: none"> • Total investment value: USD 1.48 million (44.4 million MT) - A mid/long-term loan with low interest rates will be required for this investment.
8. Financial Viability	- IRR 18%

9. Required Infrastructure	<ul style="list-style-type: none"> - Improvement of access road conditions for the farm. - Extension of electricity distribution lines to the farm.
10. Economic and Social Impacts to Local Economy	<ul style="list-style-type: none"> - The project will create employment opportunities for the local population. <p>(Existing farm)</p> <ul style="list-style-type: none"> • Poultry sector: 50 permanent workers • Macadamia nut farm: 50 workers (10 permanent workers, 40 seasonal workers) <p>(New farm: 1,000~1,500 Ha)</p> <ul style="list-style-type: none"> • Land preparation: 300 seasonal workers • Soybean production: 45 permanent workers • Macadamia farm: 350 workers (50 permanent workers, 300 seasonal workers) <ul style="list-style-type: none"> - Local farmers in the Lichinga area will be motivated to produce more grains such as maize and soybeans as a result of the secured market for the poultry industry.
11. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: B (Need for EIA: Simplified environmental report) - Mitigation measures: Land-use planning, Proper treatment of solid waste and effluent - Recommendations for monitoring and/or compensation: Yes
12. Other Information	<ul style="list-style-type: none"> - The Lichinga area is suitable for the production of macadamia nuts due to its climate and soil conditions. It will have great potential of becoming competitive with macadamia nuts produced in South Africa, Australia and other countries due to the relatively low production costs resulting from rain-fed cultivation. - Since a macadamia nut tree require a longer period of time, around 7 to 10 years, to mature prior to producing a sufficient yield, it is necessary to find a long-term loan for the investment in order to provide an operating cash flow during the early stages of the project.

13. Map of the project site



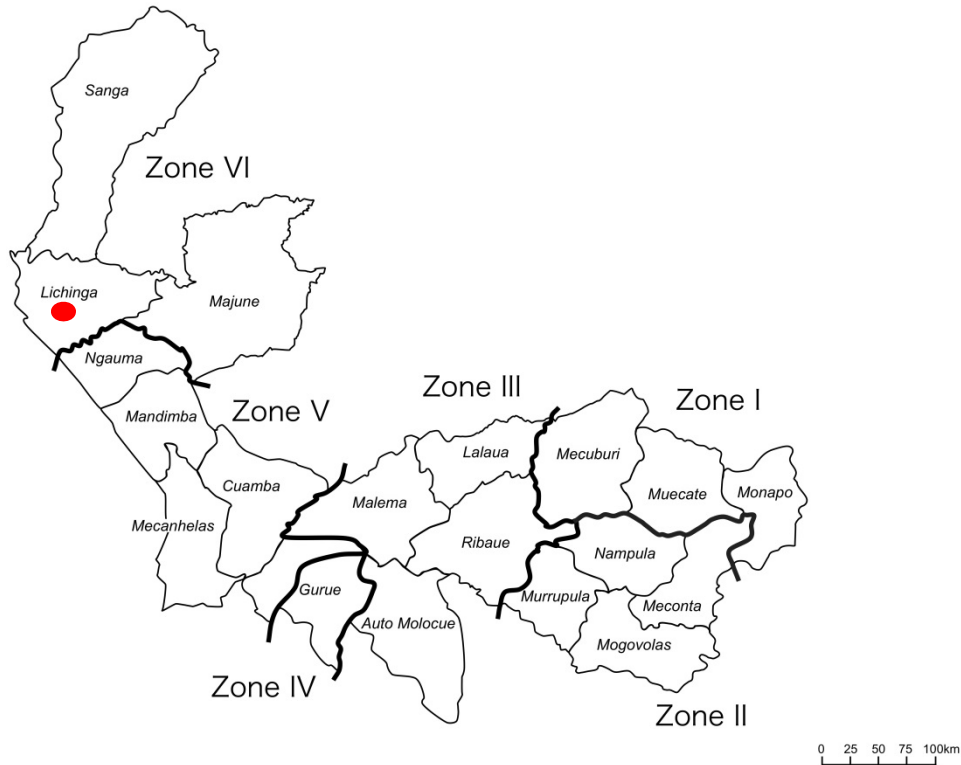
Quick Impact Project (Private Investment)

Project Title: (2) Promotion of an out-grower scheme for soybean production	
1. Project Site	- Lichinga and the surrounding area, Niassa Province (Zone VI)
2. Project Summary	<ul style="list-style-type: none"> - The company began producing soybean and maize in 2012 on 470 Ha of its own farm. Though there is a plan to expand the cultivation area on its own farm up to 2,500 Ha by 2015, the company is planning to promote an out-grower scheme for producing soybean by contracting with around 1,000 small-scale farmers. The company will provide necessary inputs (quality seed, inoculant, fertilizer and chemicals) and mechanized cultivation services on credit together with technical assistance to out-growers. - Considering the increased amount of produce from its own farm and out-growers, the company plans to construct silos with a 5,000 ton storage capacity.
3. Justification (Market promotion, comparative advantage, etc.)	<ul style="list-style-type: none"> - There is a strong domestic demand for soybean, especially from the poultry industry, as well as the future opportunity to refine soy oil domestically. - Through the promoting of the out-grower scheme, this could accommodate local community's needs by engaging them in commercial production and gaining their trust, which would benefit both the local population and the company.
4. Project Partners (Implementation, Beneficiaries/ Target Groups)	<ul style="list-style-type: none"> - 1,000 local farmers who have more than 1 Ha of farm land as out-growers. - Malonda Foundation - The company's sister project operated in Lioma, which implemented the out-grower scheme in the 2012/13 crop season with 800 local farmers.
5. Main Products or Services	<ul style="list-style-type: none"> - Out-grower scheme (1,000 local farmers; 1,000 Ha~1,500 Ha) <ul style="list-style-type: none"> • Soybean: 1,500~1,800 tons per year
6. Project Schedule	<ul style="list-style-type: none"> - 2013: i) Submission of a proposal to the ProSAVANA Development Initiative Fund; ii) promotion of the out-grower scheme and organizing farmer groups for concluding contract agreements; iii) the procurement of necessary equipment (seed, fertilizer, inoculants); and iv) holding technical trainings for out-growers. - 2013-2014: 1st round production by out-growers (the same process will be applied every year for implementing the out-grower scheme over 5 years).
7. Financial Requirements - Investment Value - Required Finance	<ul style="list-style-type: none"> - Input costs (seed, fertilizer, other costs): 4,500,000 MT (USD 150,000) - Mechanized service costs: 3,600,000 MT (USD 120,000) - Operating costs: 2,250,000 MT (USD 75,000) - An affordable agricultural loan is required to cover 50% of the above cost of implementing the out-grower scheme.
8. Financial Viability	<ul style="list-style-type: none"> - It is expected to become a commercially viable operation within 5 years. - IRR 13 %
9. Required Infrastructure	<ul style="list-style-type: none"> - Major infrastructural development is not required to initiate the out-grower scheme. - A warehouse will be constructed to store the produce in proper conditions.
10. Economic and Social Impacts to Local Economy	<ul style="list-style-type: none"> - Local farmers can obtain agriculture inputs, technical guidance and a guaranteed buyer by participating in the out-grower scheme, which will improve their livelihoods through increased income. Out-growers engaged in the project will also acquire proper agriculture techniques and skills for farm management. - There could be the potential to further expand the out-grower scheme in other localities for the production of other crops in addition to soybean, which would benefit local populations.
11. Environmental and Social Considerations (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None

12. Other Information

- The company can apply the experiences and lessons learned from the sister project in Lioma, Gurue District to the implementing of this out-grower scheme.

13. Map of the project site



Quick Impact Project (Private Investment)

Project Title: (3) Development of a cassava processing factory and promotion of contract-farming with small-scale farmers for the production of cassava and other crops

<p>1. Project Site</p>	<ul style="list-style-type: none"> - A project site will be found in/around the Lioma plain (either in the Malema, Cuamba or Gurue districts). (Zone V) - The necessary area for the project will be around 5,000 Ha on which a processing factory, storage facility, farmland, irrigation dam and other facilities will be located.
<p>2. Project Summary</p>	<ul style="list-style-type: none"> - A cassava processing factory will be established to produce: 1) cassava starch (for human consumption); 2) modified cassava starch (for industrial use); and 3) ethanol. Around 75% of the raw materials (raw cassava) to be used at the factory will be produced by small-scale farmers in the surrounding area under contract-farming arrangements with the company. It is planned that 200 tons of raw cassava will be processed daily at the factory in the early stages of the operation. Processing capacity will be increased up to 800 tons per day. It is expected that around 10,000~15,000 small-scale farmers will be engaged in cassava production as out-growers. - Along with cassava production, the company will promote production of other crops, such as maize and soybean, in order to promote crop rotation by out-growers.
<p>3. Justification (Market promotion, comparative advantage, etc.)</p>	<ul style="list-style-type: none"> - The project site has great potential for the production of cassava as well as maize and soybean due to the climate and soil conditions. - The Lioma plain and surrounding area have potential for agro-industrial development since private agribusiness investment has accumulated within the region in recent years. - Demand for cassava starch (both for human consumptions and industrial use) has been growing in the international market. - Small-scale farmers in this area have widely produced cassava, maize, and soybean so the company could easily find groups of out-growers for contract-farming.
<p>4. Project Partners</p>	<ul style="list-style-type: none"> - 10,000~15,000 out-growers either in the Malema, Cuamba and Gurue Districts. - Agribusiness companies operating in the Lioma Plain and surrounding areas.
<p>5. Main Products or Services</p>	<ul style="list-style-type: none"> - Raw cassava necessary for the factory: 200 tons per day (max: 800 tons per day) - Products (cassava starch, modified cassava starch and ethanol): 13,000~15,000 tons per year (max: 30,000 tons per year) - Maize and soybean sold to the local market.
<p>6. Project Schedule</p>	<ul style="list-style-type: none"> - 2014: Identification and registration of the project site for the obtaining of DUAT. - 2014-2016: Construction of factory/facilities and installation of equipment. - 2014-2015: Propagation of seedlings for an improved variety of cassava on the farm. - 2015-2016: Organization of farmer's group for contract-farming of cassava, maize and soybean. - 2017- : Start partial operation of cassava processing.
<p>7. Financial Requirements - Investment Value</p>	<ul style="list-style-type: none"> - Initial investment cost: 35 million USD - Final investment value will be around 50 million USD. - It is expected that an international investment fund will finance the project.
<p>8. Financial Viability</p>	<ul style="list-style-type: none"> - The company considers this project as a long-term investment that will generate financial returns over the long-term.
<p>9. Required Infrastructure</p>	<ul style="list-style-type: none"> - It is necessary to install a water supply system (well), electricity, a wastewater and treatment pond, and rehabilitate access roads to the factory site from the main road (depending on the location of the factory). - An irrigation system will be installed on the farm.

10. Economic and Social Impacts to Local Economy	<ul style="list-style-type: none"> - Increase in employment opportunities. - Increase in farmer's income through improved productivity as a result of participating in contract-farming. - Increase in crop production and improvement in out-grower's cultivation techniques.
11. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: A (Need for EIA: Full environmental impact study) - Mitigation measures: Land-use planning, Factory engineering design, Fair and lawful farming contract - Recommendations for monitoring and/or compensation: Yes
12. Other Information	<ul style="list-style-type: none"> - In the Lioma Plain several agribusiness companies have conducted medium and large-scale farming operations for the production of crops such as soybean, maize, beans and cotton on corporate farms as well as through contract-farming with local farmers. This is expected to create synergies by establishing strategic partnerships with those agribusiness firms for creating the agribusiness cluster.

13. Map of the project site



Quick Impact Project (Private Investment)

Project Title: (4) Promotion of an out-grower scheme for soybean production	
1. Project Site	- Lioma, Gurue District, in Zambezia Province (Zone V)
2. Project Summary	<ul style="list-style-type: none"> - The company has implemented an out-grower scheme for soybean production in the 2012/2013 planting season with 62 farmers, for which the total land area was 330 Ha. This project intends to expand this scheme so as to involve more local farmers in production. The total number of out-growers is expected to reach 130 within a few years. - The company will create a full-service contract with out-growers, providing land preparation and planting services via tractor, high quality seed, fertilizer on credit, and the purchase of the produce at a better price. The company will procure 2 tractors to provide those services to the out-growers in a timely manner.
3. Justification (Market promotion, comparative advantage, etc.)	<ul style="list-style-type: none"> - The project site, Lioma plain, has great potential for producing soybean due to soil conditions and agro-ecological characteristics suitable to soybean production. - Since other agribusiness companies have been conducting medium to large scale mechanized farming of soybean in Lioma, it is expected to rapidly increase the total volume of production within the area, which could induce future investment in agro-processing industries.
4. Project Partners (Implementation, Target Groups)	- Local farmers as out-growers (around 130 out-growers)
5. Main Products or Services	<ul style="list-style-type: none"> - Soybeans <ul style="list-style-type: none"> • 1st year (with 100 out-growers): 600 tons • 2nd year~ (with 130 out-growers): 780 tons
6. Project Schedule	<ul style="list-style-type: none"> - 2013: Submission of proposal to the ProSAVANA Development Initiative Fund (a soft loan scheme for the agribusiness companies). - 2013: i) Promotion of the out-grower scheme and organizing farmer groups for concluding contract agreements; ii) the procurement of necessary equipment (high quality seeds, inoculant, etc.); and iii) the holding of a series of technical trainings for out-growers concerning farm management. - 2013-2014: The 1st round production by 100 out-growers (the same process will be applied every year of implementing the out-grower scheme). - 2014~: From the 2nd year, this will involve 130 out-growers for soybean production (total land area will be targeted at 650 Ha).
7. Financial Requirements - Investment Value - Required Finance	<ul style="list-style-type: none"> - Procurement of 2 tractors: USD 54,000 - Operating cost: USD 46,000 <ul style="list-style-type: none"> ◇ Total: USD 100,000 (3 million MT) - An affordable agricultural loan at a low interest rate will be required to widely promote the out-grower scheme.
8. Financial Viability	- IRR: 21%
9. Required Infrastructure	- The company wants to install electricity in future; however the exorbitantly high cost for the installation is a hindering factor. The government quoted USD 1.2 million to extend electricity distribution lines from the nearest branch point.
10. Economic and Social Impacts to Local Economy	<ul style="list-style-type: none"> - Out-growers involved in the project will learn effective production systems, using agriculture machinery, which will result in increased production per unit of land. - It would have the potential to further increase the number of out-growers, involving more small-scale farmers (who have land of less than 2 Ha) in the surrounding area if the company establishes an efficient extension mechanism, taking advantage of economies of the scale.

<p>11. Environmental and Social Consideration (Summary of EIA pre-screening)</p>	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
<p>12. Other Information</p>	<ul style="list-style-type: none"> - The company owns 2,500 Ha of land, and in the 2012/2013 planting season 800 Ha of land were used for producing mainly soybean. An increase in the production area up to 2,000 Ha is planned for the next crop season in 2013. - The average land area for each out-grower is around 5 ha with a range from 2 to 10 Ha.

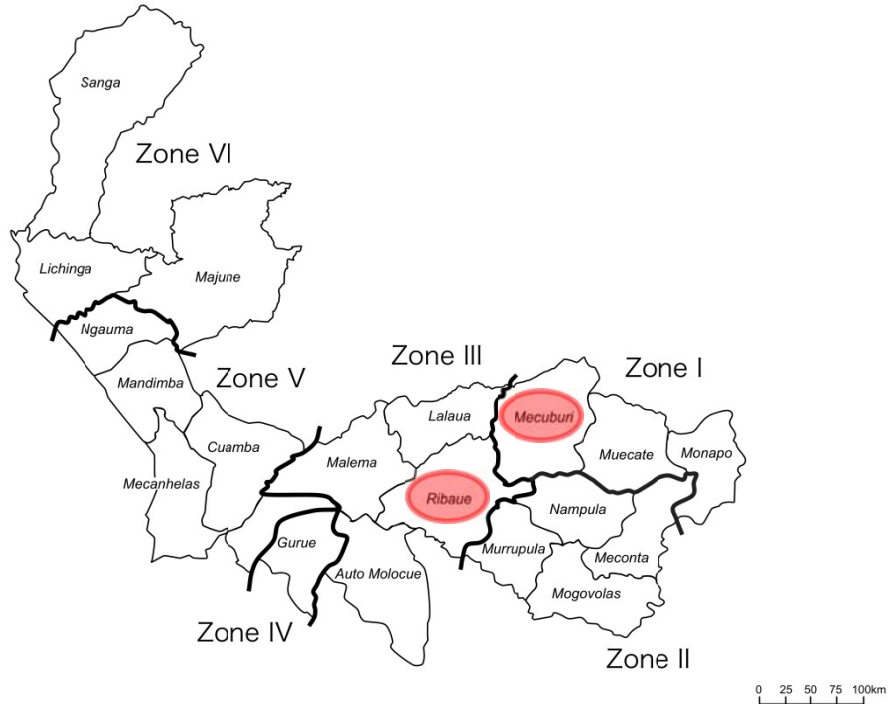
13. Map of the project site



Quick Impact Project (Private Investment)

Project Title: (5) Promotion of seed production by out-growers under contract-farming arrangements	
1. Project Site	- Ribaué (Zone III) and Mecuburi (Zone I) Districts, Nampula Province
2. Project Summary	<ul style="list-style-type: none"> - The company has initiated seed production since 2006 and is currently working with 20 out-growers for producing a variety of crop seed, such as maize, groundnut, sesame and beans. - In order to expand service coverage of the seed business, the company plans to work with more out-growers for seed production through contracting with 3 farmer's associations in Ribaué and Mecuburi Districts, involving around 80 farmers as out-growers. This is expected to result in the production of 500 Kg of crop seed within 3 years, which will result in an increase in the current production volume by 30%. - A warehouse equipped with a seed processing factory will be constructed in order to improve the host-harvest system for the increased volume of product.
3. Justification (Market promotion, comparative advantage, etc.)	<ul style="list-style-type: none"> - The increase in the production volume of high quality crop seed is one of the priority policy agendas of the government due to a shortage of quality seed at the local level that has resulted in low productivity. - The involvement of more private companies in seed production will be key to increasing production volume and improving distribution channels for high quality seed at the district level.
4. Project Partners (Implementation, Target groups)	<ul style="list-style-type: none"> - Seed producer's association in Ribaué District, Nampula Province - Two farmer's associations in Mecuburi District, Nampula Province <ul style="list-style-type: none"> ✧ Totaling around 80 out-growers with 600 Ha of land
5. Main Products or Services	<ul style="list-style-type: none"> - Crop seed (sesame, ground nut, soybean, maize, cowpea, sorghum) <ul style="list-style-type: none"> ✧ Totaling 400 ~500 tons per year
6. Project Schedule	<ul style="list-style-type: none"> - 2013: i) Organizing of farmer's groups as out-growers for seed production; and ii) submission of a proposal to ProSAVANA Development Initiative Fund. - 2014~2016: The supporting of seed production by out-growers through: (i) the procurement of necessary equipment (<i>basic seed</i>, fertilizer, etc.); ii) conducting technical trainings for out-growers; iii) regular monitoring and technical backstopping; and iv) processing and marketing of produced seed.
7. Financial Requirements - Investment Value - Required Finance	<ul style="list-style-type: none"> - Installation of processing facility: USD 80,000 (2.4 million MT) - Construction of warehouse: USD 100,000 (3 million MT) - Procurement of agriculture inputs and operating costs: USD 20,000 (600,000 MT) <ul style="list-style-type: none"> ✧ Total USD 200,000 (6 million MT) - A soft loan is required to promote the out-grower scheme for seed production.
8. Financial Viability	- IRR: 36%
9. Required Infrastructure	- Major infrastructure is not required for implementing this project.
10. Economic and Social Impacts to Local Economy	<ul style="list-style-type: none"> - As a result of the increased production of high quality crop seed, small-scale farmers can easily access that seed, which is expected to become available in local retail shops, thus resulting in improved crop productivity. - Out-growers involved in the project will acquire technical skills in proper farm management for seed production as well as be given opportunities for achieving more stable incomes since the price of seed is much higher than that of crops.
11. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
12. Other Information	- Availability of quality <i>basic seed</i> at an affordable price is the main challenge to seed production/multiplication business in the Nacala Corridor due to the limited capacity of research institutes to produce <i>basic seed</i> .

13. Map of the project site



Quick Impact Project (Private Investment)

Project Title: (6) Tea industry revitalization project: promotion of the out-grower model for tea production

1. Project Site	- Gurue, Zambezia Province (Zone IV)
2. Project Summary	<ul style="list-style-type: none"> - There are over 8,000 Ha of potential tea garden land in Gurue District, but only 65% is operational due to destruction during the civil war, insufficient replanting of trees older than 70 years old, and declining government support after the privatization of the state plantations. In order to revitalize the tea industry in Gurue, this project aims to increase productivity and the production area through the promotion of an out-grower scheme involving more local farmers in tea production. The Tea Producer's Association in Gurue will take a leading role in facilitating the promotion of the out-grower scheme. - In order to accelerate the replanting of old tea trees, an improved variety of tea seedlings will be imported from Malawi, which will then be planted in a new production area allocated within a corporate farm as a trial with out-growers taking responsibility for the management of the new tea garden. Cuttings taken from improved tea trees will then be used for the propagation of seedlings at the company's nursery.
3. Justification (Market promotion, comparative advantage, etc.)	<ul style="list-style-type: none"> - Tea production and processing is a unique and important local industry found only in the highlands of Zambezia Province, amounting to 7,000 tons per year and creating 4,000 jobs in Gurue District alone. - Gurue tea, "<i>Cha de Gurue</i>," is an established brand name, and around 85% of the total production is exported to the international market. - The revitalization and promotion of the tea industry is one of the priority areas Zambezia Province referred to in its development plan.
4. Project Partners (Implementation, Beneficiaries/ Target Groups)	<ul style="list-style-type: none"> - Tea Producer's Association in Gurue (consists of 5 private tea companies) - Out-growers (small-scale farmers) in Gurue - Tea Research Foundation in Malawi (provision of high quality tea seedlings)
5. Main Products or Services	<ul style="list-style-type: none"> - An out-grower model for the tea production is established. - Technical know-how on the management of tea farms is transferred to out-growers. - Seedlings of the improved variety of a tea tree are produced for the replacement of old trees. - The amount of green leaves produced by the out-growers: <ul style="list-style-type: none"> ◇ At the designated tea garden (48 Ha): 290~300 tons per year (6 tons per Ha) ◇ At the new tea garden (5 Ha with improved variety): 15~75 tons per year (full-production will be attained at year 6~7: 15 tons per Ha at most)
6. Project Schedule	<ol style="list-style-type: none"> 1) Out-grower scheme (trial phase: 4 years): A block of tea gardens (48 Ha) owned by the company will be allocated to 6 groups of out-growers (total 48 farmers). <ul style="list-style-type: none"> - 2013: Submission of a proposal to ProSAVANA Development Initiative Fund. - 2014: i) Promotion of the out-grower scheme and organizing of farmer's groups; ii) procurement of necessary equipment; and iii) the holding of a series of technical trainings for out-growers. - 2014~: Production of tea leaves by out-growers at the allocated tea garden. 2) The planting of an improved variety of tea seedlings for the establishment of a new tea garden in the company's own farm. <ul style="list-style-type: none"> - 2014: i) Procurement of seedlings from Malawi; ii) land preparation for the replanting; and iii) planting of seedlings. - 2014~: Management of the newly established tea garden by out-growers. - 2017~: Propagation of tea seedlings at the company's nursery.
7. Financial Requirements - Investment Value	<ul style="list-style-type: none"> - A soft loan is required to initiate the out-grower scheme for tea production. - Project cost of the out-grower scheme (area: 48 Ha): 2 million MT

- Required Finance	- Cost of the establishment of a new tea garden with an improved variety of tea seedlings (area: 5 Ha): 3.5 million MT
8. Financial Viability	- Out-grower scheme: IRR 13%
9. Required Infrastructure	- Major infrastructure is not required for implementing the project. - The company owns a tea processing factory and storage.
10. Economic and Social Impacts to Local Community	- It will increase the incomes of small-scale farmers engaged in tea production as out-growers as well as the profitability of the company, which would contribute to the growth of the regional economy in Gurue. - It will contribute to the revitalizing of the tea industry, which has declined over the years.
11. Environmental and Social Consideration (Summary of EIA pre-screening)	- Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
12. Other Information	- As the tea industry needs a large amount of wood for the drying process of green leaves, it is necessary to carefully monitor for illegal logging.

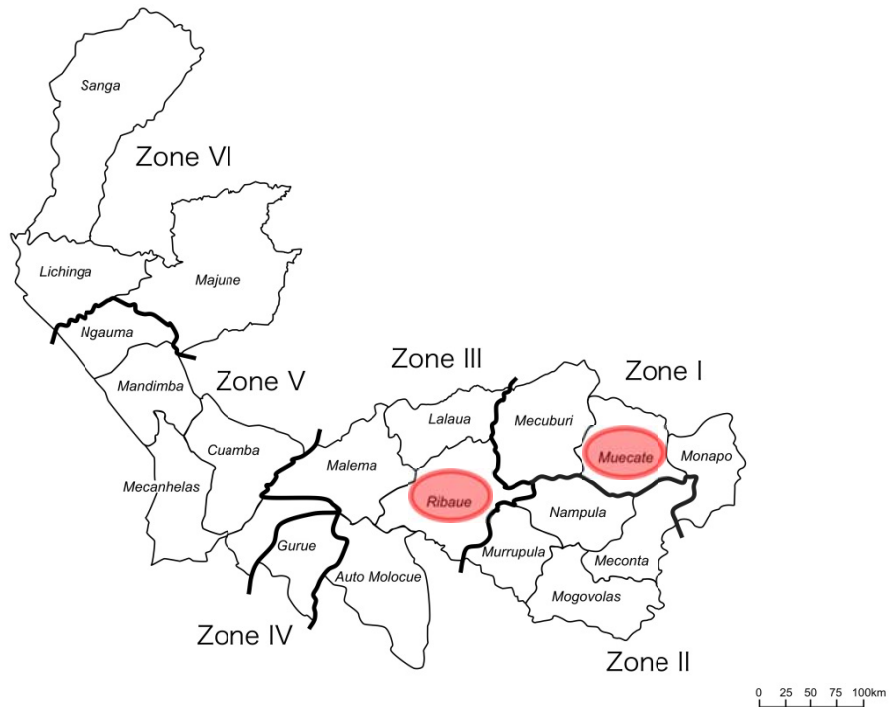
13. Map of the project site



Quick Impact Project (Private Investment)

Project Title: (7) Promotion of contract-farming for crop production with small land holders	
1. Project Site	- Meconta (Namialo) District (Zone I), Ribaué (Iapala) District (Zone III) in Nampula Province
2. Project Summary	<ul style="list-style-type: none"> - The project covers 2 contract-farming operations with small-scale farmers at Namialo in Meconta District and Iapala in Ribaué District. The company regards these operations as core sources for its crop supply, and important components in its vision for improving the yields and quality of crops in the family sector. - Two types of contracts will be made with small-scale farmers for contract-farming: i) a “full-service” contract that involves the production of two or more crops, the provision of a package of inputs that includes seed, fertilizer and limited pesticides, as well as a mechanized land preparation service where appropriate, and more intensive training and monitoring; and ii) a “seed-for-crop” contract under which seed, planting instructions and guaranteed crop purchase are provided.
3. Justification (Market promotion, comparative advantage, etc.)	<ul style="list-style-type: none"> - The company’s primary business objective is to add value in the agricultural supply chain by linking small-scale farmers to better inputs, credit, logistics and markets. - The company acts as a catalyst for better farming practices and greater productivity, which could create the space to earn a margin from supplying inputs and services and in marketing the outputs.
4. Project Partners (Beneficiaries/ Target Groups)	<ul style="list-style-type: none"> - 400~500 out-growers with a “full-service” contract - 800~1,000 out-growers with a “seed-for-crop” contract
5. Main Products or Services	<ul style="list-style-type: none"> - Crop production: soybean (300 tons), maize (300 tons), and sesame (120 tons) - Seed production: soybean (300 tons) and sesame (150 tons)
6. Project Schedule	<ul style="list-style-type: none"> - 2013.7: Submission of a proposal to ProSAVANA Development Initiative Fund - 2013.10~11: Consultation with farmers’ groups for contract arrangements - 2013.12 ~ 2014. 7: Crop production and purchasing according to the contract
7. Financial Requirements - Investment Value - Required Finance	<ul style="list-style-type: none"> - Implementation of contract-farming for 1 crop season (Dec. to July for 8 months): USD 150,000 - A short term loan with low interest rates is required to widely carry out contract-farming due to the nature of business involving small-scale farmers.
8. Financial Viability	- Expected financial returns will be 34% for 8 months
9. Required Infrastructure	- Improvement of access road conditions (rural roads) is necessary to widely expand the contract-farming model to rural communities.
10. Economic and Social Impacts to Local Economy	<ul style="list-style-type: none"> - Livelihood of small-scale farmers who participate in contract-farming will be improved as a result of increased income as a consequence of having a secured market and increased production. - Proper agriculture techniques using locally available quality seed and inputs will be widely promoted if the number of out-growers is increased.
11. Environmental and Social Considerations (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
12. Other Information	-

13. Map of the project site



Quick Impact Project (Private Investment)

Project Title: (8) Establishment of the Mill for Poultry Feed and Flour Production (by the Cooperative)

1. Project Site	- Cuamba, Niassa Province (Zone V)
2. Project Summary	<ul style="list-style-type: none"> - This project would allow the Cooperative to better serve its members through the construction of a mill and the start-up of poultry feed and flour production programs. - The mill would allow the Cooperative to add value to soybean and maize through the production and sale of flour and poultry feed. This value-add processing will provide an additional sales outlet for members' crops and assist in the co-op's goal of the increase of members' incomes. - When the cooperative is not using the milling equipment for its own production purposes, it would be available to local residents at a fee.
3. Justification (Market promotion, comparative advantage, etc.)	<ul style="list-style-type: none"> - Maize flour is a staple food through Mozambique and in high demand. Flour the Cooperative produces would be sold in local public markets. Maize flour is sold in Cuamba for approximately 20 MT per Kg while maize as an unprocessed agricultural crop sells for approximately 5 MT per Kg. The 15 MT delta represents an opportunity for the Cooperative to add-value to member's products through processing. - Southern Niassa Province does not currently produce any poultry feed, and those interested in raising poultry need to travel outside of the province to purchase feed. Poultry farmers in the area currently travel to Nampula or Malawi to purchase feed, incurring significant costs. The Cooperative is in a position to become the first producer of poultry feed in Niassa Province. Producing feed also opens up opportunities for cooperative members to raise poultry.
4. Project Partners (Implementation, Beneficiaries/ Target Groups)	<ul style="list-style-type: none"> - Implementation: The Cooperative would manage implementation of the project. Additional project management support would come from a Peace Corps Volunteer working with the Cooperative. Throughout the design and planning of the project, a local NGO has provided technical assistance to the Cooperative. - Beneficiaries/Target Groups: <ul style="list-style-type: none"> ✧ The project's main beneficiaries are the co-op members, small-scale farmers from throughout Southern Niassa Province. Nearly all of co-op members cultivate less than 5 hectares. The cooperative's members would benefit from better market access for their agricultural products and higher incomes. ✧ While co-op members represent the project's primary beneficiaries/target group, general consumers and poultry farmers in Southern Niassa, who would be the customers for the mill's products, would be a secondary target group. Both current and potential poultry farmers would have local access to poultry feed, which is not currently sold/produced in Niassa Province. The general population would have access to an additional provider of maize flour, which is the staple food in Mozambique.
5. Main Products or Services	<ul style="list-style-type: none"> - Maize flour and poultry feed - Use of mill equipment for a fee when not used by the Cooperative
6. Project Schedule	<ul style="list-style-type: none"> - Procurement of mill equipment and supplies: Month 1 - Delivery of equipment and supplies: Month 2 - Construction of the mill facility: Month 2-4 - Installation of mill equipment: Month 4 - Initiation of milling and production: Month 5 - Sale of products: Month 5 and on-going
7. Financial Requirements	<ul style="list-style-type: none"> - Investment value: USD 21,500 (645,000 MT) <ul style="list-style-type: none"> ✧ Milling equipment: USD 12,000 ✧ Milling facility and building: USD 9,500 - A soft loan is required to cover the initial investment cost.

8. Financial Viability	<ul style="list-style-type: none"> - The Cooperative is currently undertaking a market analysis/feasibility study; initial analysis points to both access to an additional market for member-farmers and a profitable business for the Cooperative and its members.
9. Required Infrastructure	<ul style="list-style-type: none"> - Major infrastructure is not required.
10. Economic and Social Impacts to Local Economy	<ul style="list-style-type: none"> - The primary social/economic impact would be increased income for co-op member farmers. They would benefit from an additional outlet for their products and increased incomes. - Principal secondary impacts would be increased market opportunities for poultry farming due to local availability of poultry feed and the availability of additional flour providers for general consumers. - The additional opportunity for members to sell agricultural products would likely help in gradually increasing the number of member-farmers who move from subsistence farmers to small-scale farmers, emerging farmers and ultimately, commercial farmers. This shift will have numerous social impacts. The increase in income is the primary goal of co-op members, and it is believed nearly all of the impacts would be positive, including better access to education, health care, and an increased standard of living. - Transportation associated with the purchase of poultry feed (currently not sold in the local area) and distribution of maize flour (to be sold locally) would be greatly reduced.
11. Environmental and Social Consideration (Summary of EIA pre-screening)	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
12. Other Information	<ul style="list-style-type: none"> - The Cooperative is a farming co-op founded in 2010, and it has grown to 550 individual and collective members from throughout southern Niassa Province. Its aids these members in the sale of their agricultural products, providing better market access and allowing small-scale farmers to increase their income and expand production. The Cooperative's 2013 commercialization campaign plan calls for the commercialization of 1,492 tons of agricultural products (includes both member and non-member products). The primary agricultural products the Cooperative brings to market for farmers are: soy, sesame, ground nuts, mung beans and pigeon peas. The Cooperative provides access to inputs as well as extension support for its members, and has collection points in the six southern Niassa districts.

13. Map of the project site



Table 4.1.4 Summary of the Business Models of QIPs proposed by Agribusiness Companies

	1. The expansion of poultry business	2. Promotion of out-grower scheme for soybean production	3. Development of a cassava processing factory and promotion of contract-farming with small-scale farmers for the production of cassava and other crops
1. Project Site/Zone	- Lichinga Town and the surrounding area (Zone VI) in Niassa Province	- Lichinga and the surrounding area (Zone VI) in Niassa Province	- Lioma Plain (either in the Malema (Zone III), Cuamba (Zone V) or Gurue Districts (Zone V))
2. Details of the Business	- Establishment of an integrated poultry production system - Expansion of a macadamia nut farm	- Soybean production through contract-farming with local farmers along with mechanized large-scale farming operations on its own farm	- Agro-industry development (cassava processing factory) with the production of cassava through contract-farming arrangements with local farmers
1) Products	- Soybean (chicken feed), Broiler, Chicks - Macadamia nuts	- Soybean	- Cassava (raw materials), industrial products (cassava starch and ethanol) - Maize and soybean
2) Market/Value Chain	- The domestic demand for chicken meat is high. - The company intends to develop vertically integrated production systems for the poultry industry from feed production, breeding, and broiler production to the marketing of products. - There is demand for chicks and feed from small-scale broiler producers in the surrounding area. - Macadamia nuts have a promising market in South Africa.	- There is a strong domestic demand for soybean, especially from the poultry industry. - The company plans to sell soybean to other parts of Mozambique since the market in the Lichinga area is limited compared to the company's expected production volume. - Since a shareholder of the company owns a poultry factory, it would enable the company to create a value chain for the poultry industry among its sister companies.	- Demand for cassava starch (both for human consumptions and industrial use) has been growing in the international market. - 75~80 % of the product will be exported to the international market. - There is increased demand for cassava cake from a local brewery, which uses it to brew beer made up of 70% cassava and 30% malt.
3) Land Title (DUAT)	- In the process of obtaining DUAT for 1,500 Ha	- Obtained DUAT for 3,800 Ha of land	- In the process of identifying a project site
4) Finance	- Investment value: USD 1.48 million - A mid/long-term loan with a low interest rate will be required.	- Investment value: USD 345,000 - An affordable agricultural loan is required to cover 50% of the cost of implementing the out-grower scheme.	- Initial investment value: USD 35 million - An international investment fund will finance the project.
5) Contract-farming	- Contract-farming arrangements will be applied in the future for the production of soybean.	- This is planned to involve around 1,000 local farmers in the contract-farming of soybean - Total production area of out-growers will reach 1,000~1,500 Ha.	- It is expected that around 10,000~15,000 small-scale farmers will be engaged in cassava production as out-growers.
6) Infrastructure	- Improvement of access road conditions. - Extension of electricity distribution lines.	- A warehouse will be constructed to store the produce in proper conditions.	- Installation of a water supply system (well) and electricity. - Rehabilitation of access roads.
7) Financial Viability	- Expected IRR: 18%	- It is expected to become a commercially viable operation within 5 years. - Expected IRR: 13%	- The company considers this project as a long-term investment that will generate financial returns in the long-term.

8) Impact to Local Economy/Communities	<ul style="list-style-type: none"> - Creation of employment opportunities for the local population. 155 permanent workers and seasonal workers will be hired by the company. 	<ul style="list-style-type: none"> - Out-growers will acquire proper agriculture techniques and skills for farm management as well as realize improved livelihoods through increased income. 	<ul style="list-style-type: none"> - Increase in employment opportunities at the processing factory and the corporate farm. - Increase in farmer's income through improved productivity as a result of adjoining contract-farming.
3. Environment and Social Considerations	<ul style="list-style-type: none"> - Concerns related to Site selection: Yes; Beneficiary targeting: None - Supposed environmental category: B (Need for EIA: Simplified environmental report) - Mitigation measures: Land-use planning, Proper treatment of solid waste and effluent - Recommendations for monitoring and/or compensation: Yes 	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None 	<ul style="list-style-type: none"> - Increase in employment opportunities. - Increase in farmer's income through improved productivity as a result of participating in contract-farming. - Increase in crop production and improvement in out-grower's cultivation techniques.
4. Other Information	<ul style="list-style-type: none"> - The Lichinga area is suitable for the production of macadamia nuts due to its climate and soil conditions. - A long-term loan is necessary for the expansion of the macadamia nut garden since it will take 7~10 years to reach full-production. 	<ul style="list-style-type: none"> - In the Lichinga area, the forestry companies have been engaged in contract-farming for soybean and other crops as a way to realize their company's social responsibility and in order to avoid social conflicts with local communities. 	<ul style="list-style-type: none"> - Along with cassava production, the company will promote the production of other crops, such as maize and soybean, in order to promote crop rotation by out-growers.
5. Summary of the Business Model	<ul style="list-style-type: none"> - Taking advantage of the prospect of increased demand for chicken meat, the company plans to establish integrated production systems, which could result in financial strengthening through reduced transaction costs and improved productivity for broilers. - Sales of macadamia nuts will greatly contribute to profits over the long-term. - It is advisable to apply the out-grower scheme for soybean production to chicken feed in order to complement the volume produced on its own farm. 	<ul style="list-style-type: none"> - The company's primary business model is to expand mechanized farming operations at their own farm to achieve high productivity. - The company is also interested in the expansion of the out-grower scheme, if it is financially viable, in order to increase the volume of production. - Under the contract-farming arrangements, a complete package of services including the provision of necessary inputs and mechanized land preparation services will be provided to out-growers. - The company can apply the experiences and lessons learned from its sister project in Lioma, Gurue District to the implementing of this out-grower scheme. 	<ul style="list-style-type: none"> - Taking advantage of the increased demand for cassava starch on the international market, the company plans to establish a comprehensive cassava processing factory on the Lioma Plain, which has great potential for the production of cassava and other crops due to its climate and soil conditions. - In order to secure the necessary amounts of raw materials to be delivered for the factory, it is planned to involve more than 10,000 local farmers as out-growers for cassava production. - The company's ultimate business goal is to create an agro-industry cluster in partnership with other agribusiness firms operating in the Lioma Plain.

	4. Promotion of an out-grower scheme for soybean production	5. Promotion of seed production by out-growers under contract-farming arrangements	6. Tea industry revitalization project: promotion of the out-grower model for tea production
1. Project Site/Zone	- Lioma, Gurue District (Zone V) in Zambesia Province	- Ribaua (Zone III) and Mecubri (Zone I) Districts in Nampula Province	- Gurue Town (Zone IV) in Zambesia Province
2. Details of the Business	- Soybean production through contract-farming with local farmers along with a mechanized large-scale farming operation on its own farm.	- Seed production under contract-farming arrangements with medium-scale local farmers and selected associations.	- Tea production with out-growers at a corporate tea garden along with the establishment of a new tea garden.
1) Product	- Soybean	- Crop seed (sesame, ground nut, soybean, maize, cowpea, and sorghum)	- Tea leaves and processed tea
2) Market/Value Chain	- The company will continue to sell its produce to the domestic market in the coming years due to an increased demand for soybean. - The company plans to expand its markets to the off-shore targeting of neighboring and middle-east countries where the demand for poultry feed is high. - It will have potential to rapidly increase the total volume of soybean production in the Lioma area, which could induce investment in agro-processing industries.	- Demand of quality seed is high both from the government and local farmers. - The company has a retail shop in Nampula and has a strong connection with local retailers at the district level to sell its produce. - The company has a direct delivery route to NGOs that need a large amount of quality seed for implementing agriculture extension projects.	- Tea production and processing is a unique local industry found only in the highlands of Zambesia Province in Mozambique. - Gurue tea, " <i>Cha de Gurue</i> ", is an established brand name. - Around 85% of the total production is exported to the international market (mainly to Europe). - The company has already established an entire value chain of tea products from production, processing and packaging to marketing.
3) Land Title (DUAT)	- Hold DUAT for 2,500 Ha of land	- Not necessary	- Hold DUAT for 15,000 Ha of land
4) Finance	- Investment value: USD 100,000 - An agricultural loan at a low interest rate will be required to widely promote the out-grower scheme.	- Investment value: USD 200,000 - A soft loan is required to widely promote the out-grower scheme for seed production.	- Investment value: 5.5 million MT (2 million MT for the out-grower scheme and 3.5 million for the establishment of a new tea garden) - A soft loan is required to initiate the out-grower scheme for tea production.
5) Contract-farming	- The company was involved in contract-farming with 62 local farmers in the 2012/13 planting season. - The number of out-growers will be doubled within 3 years with a goal of 130 members. - The company will make a full-service contract with out-growers, providing inputs and mechanized production services.	- The company mainly works with middle-scale farmers who have more than 10 Ha of land for the contract-farming of crop seed. - The company plans to expand its contract-farming operations to involve more out-growers by contracting with 3 farmer's associations. - The target number of out-growers to be achieved within 3 years is 80, which will result in an increase in the production volume by 30%.	- A block of tea gardens (48 Ha) owned by the company will be allocated to 48 out-growers taking responsibility for the management of tea production. - The company facilitates the planting of seedlings to establish new tea gardens under the out-grower arrangements with local farmers.
6) Infrastructure	- Installation of electricity if cost is affordable.	- Not required.	- Not required.
7) Financial Viability	- Expected IRR: 21%	- Expected IRR: 36%	- Expected IRR: 13% (out-grower scheme)

8) Impact to Local Economy/Communities	<ul style="list-style-type: none"> - Out-growers learn effective production systems, using agriculture machinery, which will result in increased production per unit of land. 	<ul style="list-style-type: none"> - Out-growers are given opportunities for achieving more stable incomes since the price of seed is much higher than that of crops. 	<ul style="list-style-type: none"> - The project will contribute to the revitalizing of the tea industry in Gurue, which has declined over the years.
3. Environment and Social Considerations	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None 	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None 	<ul style="list-style-type: none"> - Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None
4. Other Information	<ul style="list-style-type: none"> - The Lioma Plain has great potential for producing soybean due to soil conditions and agro-ecological characteristics. - The average land area for each out-grower is around 5 Ha with a range from 2 to 10 Ha. 	<ul style="list-style-type: none"> - Availability of quality foundation seed at an affordable price is the main challenge to seed production/multiplication business in the Nacala Corridor. 	<ul style="list-style-type: none"> - It will be necessary to import an improved variety of tea seedlings from Malawi, which are not available in Mozambique, in order to improve productivity by replacing old tea trees. - Cuttings taken from improved tea trees will be used for the propagation of seedlings in order to accelerate the replanting of trees.
5. Summary of the Business Model	<ul style="list-style-type: none"> - Along with crop production on their own farm (total 2,500 Ha) through mechanized farming, the company plans to expand its contract-farming operations by doubling the number of out-growers from 65 to 130 within a few years. - It is expected that the total production area of the out-growers will reach 600 Ha. - Through contract-farming arrangements, the company supports local farmers by providing inputs and mechanized services with regular technical extensions in order to encourage more productivity, which could also benefit the company due to increased production volume. - In order to take advantage of economies of scale, the company plans to obtain an additional 5,000 Ha of land in the future. 	<ul style="list-style-type: none"> - Seed business is quite profitable since its price is much higher than that of crops. However, seed producers should have enough capacity in farm management for producing quality seed. - Taking advantage of high demand for quality seed in the local market, the company's business model is to increase the production volume by effectively conducting contract-farming with selected local farmers or associations who have the capacity for and experience in seed production. - The company plans to install a seed processing machine in the warehouse to maintain the quality of products by improving post-harvest technologies. 	<ul style="list-style-type: none"> - Though the company's primary business model is the production and processing of tea leaves produced on their own tea garden by hiring labors, the company plans to initiate the out-grower scheme by allocating a block of tea gardens to local farmers. - It is anticipated that this will increase productivity and the production area through the promotion of an out-grower scheme involving more local farmers in tea production. - It is necessary to strengthen the capacity for seedling propagation for an improved variety of tea trees at the nursery to be used for planting at the new tea garden.

	7. Promotion of contract-farming for crop production with smallholders	8. Establishment of a mill for poultry feed and flour production
1. Project Site/Zone	- Meconta (Namialo) District (Zone I), Ribaue (Iapala) District (Zone III) in Nampula Province	- Cuamba in Niassa Province (Zone V)
2. Details of the Business	- Contract-farming with local farmers for crop and seed production under 2 types of contracts	- Installation and operation of the mill for feed and flour production by the cooperative
1) Product	- Crop (soybean, maize, and sesame) - Crop seed (soybean and sesame)	- Maize flour and poultry feed
2) Market/Value Chain	- Soybean and maize will be sold to the domestic market, especially to the local poultry industries. - Sesame will be exported to the international market, mainly to Asian countries. - Crop seeds will be delivered to the government and NGOs in addition to being sold to local seed retailing companies.	- Maize flour is a staple food and in high demand. - Maize flour and poultry feed will be sold at local markets in southern Niassa Province where there are no producers of feed. - Raw materials for the mill such as maize and soybean will be produced by the co-op members.
3) Land Title (DUAT)	- Not necessary	- Hold DUAT for 4Ha of land
4) Finance	- Investment value: USD 150,000 (4,500,000 MT) for implementing contract-farming for 1 crop season (8 months). - A short term loan with low interest rates is required to widely carry out contract-farming.	- Investment value: USD 21,500 (645,000 MT) - A soft loan is required to cover the initial investment costs.
5) Contract-farming	- The project covers 2 contract-farming operations through a “full-service” contract with around 500 farmers and a “seed-for-crop” contract with around 1,000 farmers.	- Since the project implementing agency is an existing cooperative, it is not necessary to create a contract-farming arrangement with members since they have already registered into the co-op.
6) Infrastructure	- Improvement of access road conditions (rural roads) is necessary to widely expand contract-farming to rural communities.	- Not required.
7) Financial Viability	- Expected financial return will be 34% for 8 months (during 1 crop season)	- A market analysis and feasibility study has been undertaken by the Cooperative. Initial analysis indicates that this project represents promising investment returns.
8) Impact to Local Economy/Communities	- Proper agriculture techniques using locally available quality seed and inputs will be widely promoted as a result of the increased number of out-growers involved in the project.	- There would be increased market opportunities for poultry farming due to the local availability of poultry feed. - The availability of additional flour providers for general consumers.
3. Environment and Social Considerations	- Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None	- Concerns related to Site selection: None; Beneficiary targeting: None - Supposed environmental category: C or less (Need for EIA: No need) - Mitigation measures: None - Recommendations for monitoring and/or compensation: None

4. Other Information	<ul style="list-style-type: none"> - The company's primary business objective is to add value to the agricultural supply chain by linking small-scale farmers to better inputs, credit, logistics and markets. 	<ul style="list-style-type: none"> - The cooperative has 550 individual and collective members from throughout southern Niassa Province, and has about 50 collection points in 6 districts to purchase crops from members.
5. Summary of the Business Model	<ul style="list-style-type: none"> - Two types of contracts will be made with small-scale farmers for contract-farming. - A "full-service" contract that involves the production of two or more crops, the provision of a package of inputs that includes seed, fertilizer and limited pesticides, as well as the mechanized land preparation service where appropriate, and more intensive training and monitoring. - A "seed-for-crop" contract under which seed, planting instructions, and a guaranteed crop purchase is provided. 	<ul style="list-style-type: none"> - The cooperative will install a mill for producing poultry feed and maize flour in order to provide opportunities for members to gain better profits, taking advantage of a price delta of 15 MT between maize flour and unprocessed maize crop. - The milling equipment will be available to local residents at a fee, which would generate additional incomes to the cooperative. - Poultry feed production is a promising business in southern Niassa Province where demand for feed by local poultry producers is high.

4.1.4 Evaluation of QIPs

With reference to the selection criteria for QIPs presented in Table 4.1.1, the proposed QIPs were reviewed in order to confirm the level of fulfillment of the criteria, justifying the necessity for carrying out the QIPs to accelerate or kick-start agriculture and agribusiness development in the Nacala Corridor. Table 4.1.5 and 4.1.6 show the results of the evaluation for the proposed QIPs.

Table 4.1.5 Results of the Evaluation (QIPs carried out by public funding)

Project (Public Sector Projects)	Criteria							Total
	1	2	3	4	5	6	7	
1. Land registration of small scale and medium scale farmers	3	2	3	3	2	-	-	13/15
2. Road improvements for marketing	3	3	2	2	3	-	-	13/15
3. Promotion of quality seed production at the regional level	2	3	3	3	2	-	-	13/15
4. Promotion of vegetable production with small pumps	3	3	2	2	2	-	-	12/15
5. Renewal of cashew trees	2	3	3	3	2	-	2	15/18
6. Planning of land reserves for medium and large scale investment	3	2	2	3	3	-	-	13/15
7. Model project for family food production cluster development	2	2	3	3	3	-	3	16/18
8. Development of agriculture special economic zone	2	2	3	3	3	-	-	13/15

(Score - 3: High, 2: Medium, 1: Low)

Table 4.1.6 Results of the Evaluation (QIPs carried out as private investment)

Project (Private Sector Projects)	Criteria							Total
	1	2	3	4	5	6	7	
1. The expansion of poultry business	3	3	2	3	3	2	2	18/21
2. Promotion of out-grower scheme for soybean production	3	2	3	3	3	2	3	19/21
3. Development of a cassava processing factory and promotion of contract-farming with small-scale farmers for the production of cassava and other crops	2	2	3	3	3	2	3	18/21
4. Promotion of an out-grower scheme for soybean production	3	2	3	3	3	2	3	19/21
5. Promotion of seed production by out-growers under contract-farming arrangements	3	3	3	3	2	2	3	19/21
6. Tea industry revitalization project: the promotion of the out-grower model for tea production	2	3	3	3	2	2	2	17/21
7. Promotion of contract-farming for crop production with smallholders	3	2	3	3	3	2	3	19/21
8. Establishment of a mill for poultry feed and flour production	3	3	3	3	2	2	3	19/21

(Score - 3: High, 2: Medium, 1: Low)

4.1.5 Implementation Plan for QIPs

(1) Implementation of public sector projects

Though QIPs are formulated to enable kick-starting activities separately under each QIP implementation structure without extensive preparatory work, it is critical that a proper coordinating body be formed with the aim of arranging available financial resources for implementing the projects, coordinating with stakeholders and concerned government offices for the initial formulation of the project implementation framework, overseeing the progress of activities during the implementation stage, and widely disseminating the results/impacts of the QIPs to the concerned stakeholders including the public, governments, donors, and private sectors. Since an implementing body for the ProSAVANA agriculture master plan would not be formally established when QIPs start implementation in 2014, the ProSAVANA Headquarters will take a coordinating role to facilitate the initiation of project activities with this responsibility being taken over by the ProSAVANA implementing body when it becomes fully functional. In terms of the day-to-day project management of QIPs, the respective provincial and district government offices will coordinate project activities with local partners such as NGOs. Table 4.1.7 summarizes the proposed implementation structure of each QIP including potential organizations as local partners for the project.

Table 4.1.7 Summary of the Proposed Implementation Structure (Public Sector Projects)

Overall Coordination: ProSAVANA Headquarters (to be taken over by the ProSAVANA Implementing Body)				
Project No.	Coordinating Body	Primary Implementing Organization	Local Partner (Implementation)	Other Partner (Ad-hoc support, etc.)
1	- DPA	- SPGC - SDAE	- consulting company	- DNTF (Central Government) - FAO (financing)
2	- DPA	- SDAE, SDPI	- NGO/ Consulting Company, - Contractor	- ANE
3	- DPA (SPA: Agriculture Service)	- IIAM North East Center in Nampula	- IIAM North East Centre in Nampula, SDAEs	- Local seed growers (private sectors) - DPA (seed inspectors)
4	- DPA	- SDAE	- NGO (that assigns extension workers)	-
5	- INCAJU	- INCAJU	- SDAE, INCAJU (extension workers)	- IIAM, NGO
6	- DPA	- SPGC	- Local consultant - SDAE	- IIAM laboratory for soil experiment
7	- DPA	- SDAE	- NGO	- Private sector (processing factory)
8	- GAZEDA	- GAZEDA	- SDAE - Government office (road, electricity, etc.) - Contractor	- Private sector (infrastructure development)

(2) Implementation of private sector projects

In contrast to the public sector projects, QIPs to be carried out by the private sector will be autonomous in terms of the formulation and implementation arrangement of the projects, which will be organized according to the business plan of each company. However, since

most QIPs expect to access the financial scheme of ProSAVANA, such as the ProSAVANA Development Initiative Fund or other financial mechanism to be introduced in the near future, in order to secure financing for covering the initial investment costs of the project, the ProSAVANA implementing body (or ProSAVANA Headquarters) will closely coordinate the formulation of project activities with the agribusiness companies as well as the concerned government offices in line with the requirements of the financing scheme along with the principles for responsible agriculture investment.

(3) The cost of implementation for QIPs

As summarized in Table 4.1.8, the implementation costs for the public sector projects were estimated in consultation with the counterparts and potential partner organizations, while that of the private sector projects were provided by the agribusinesses companies based on their experience and knowledge in formulating projects. Though the financing for the private sector projects will be determined through the efforts of each agribusiness, it is critical to find the available financing options for the public sector projects in order to initiate the planned activities in a timely manner beginning from 2014. Holding a series of stakeholder consultations involving central and local government representatives, donors, NGOs, and the private sector is necessary to secure the available financial means for QIPs. The ProSAVANA implementing body (or ProSAVANA Headquarters until the implementing body has become operational) will take a leading role in the consultation process.

Table 4.1.8 Summary of the Project Implementation Cost

No.	Project Name	Project Cost (MT)
Public Sector Project		
1	Land registration of the small scale and medium scale farmers	13,248,900
2	Road improvement for marketing	16,415,400
3	Promotion of quality seed production at the regional level	2,164,100
4	Promotion of vegetable production with small pump	11,200,112
5	Renewal of cashew trees	5,607,360
6	Planning of land reserve for the medium and large scale investment	2,400,000
7	Model project for family food production cluster development	34,922,000
8	Development of agriculture special economic zone (SEZ)	24,883,200
Sub-Total (MT)		443,060,102

No.	Project Name	Project Cost (USD)
Private Sector Project		
1	The expansion of the poultry business	720,000
2	Promotion of the out-grower scheme for soybean production	345,000
3	Development of a cassava processing factory and promotion of contract-farming with small-scale farmers for the production of cassava & other crops	35,000,000
4	Promotion of an out-grower scheme for soybean production	100,000
5	Promotion of seed production by out-growers under contract-farming arrangements	200,000
6	Tea industry revitalization project: the promotion of the out-grower model	207,000
7	Promotion of contract-farming for crop production with smallholders	150,000
8	Establishment of the mill for poultry feed and flour production	21,500
Sub-Total (USD)		36,743,500

4.2 Environmental and Social Considerations of QIPs

The present chapter will only focus on the likely adverse impacts associated with the QIPs. In-depth analysis of the grand design of the Master Plan and its projects in terms of environmental and social considerations will be presented in the Draft Final Report. See Chapter 6 for the approach of the Strategic Environmental and Social Assessment to be applied during the further study.

4.2.1 Screening and Scoping of QIPs

The 16 proposed QIPs show different progress in terms of the determination of project sites and target beneficiaries, as well as their magnitude, as summarized in Table 4.2.1.

Table 4.2.1 Project Sites and Target Beneficiaries by QIP

	Title	Project Site	Target Beneficiary	Environmental and Social Implications in relation to Site and Beneficiary
Public Sector QIPs				
1	Land registration for small scale and medium scale farmers	Determined at locality level (20,000ha in total of 4 sites)	Individual farmers of small to medium scale (number unknown)	<ul style="list-style-type: none"> - Consideration of PDUT, existent DUATs and neighboring communities. - Fair criteria for beneficiary targeting with special attention to marginalized groups (widows, divorced or childless women, etc.). - Parallel implementation of "community delimitation" as an option.
2	Road improvements for marketing	Determined at exact locations (36km in total of 2 sites)	All potential users of improved roads (number unknown)	<ul style="list-style-type: none"> - Consideration of historical site, habitats, water sources and erosion-sensitive places in planning stage.
3	Promotion of quality seed production at the regional level	Only training site is determined at IIAM-CZnd	Seed growers of 3 zones (60 participants in total are planned; their places of origin are to be determined in implementation stage)	<ul style="list-style-type: none"> - Fair criteria for beneficiary targeting.
4	Promotion of vegetable production with small pumps	Determined at district level (4 of 5 candidate districts; 110-140ha at each district in 2023)	Farmers organizations (90 individuals and 20 groups including 200 member families at each district in 2023)	<ul style="list-style-type: none"> - Consideration of "zones for partial protection", PDUTs and forest reserves in site selection; - Responsible use of water in accordance with ARA's guidance.
5	Renewal of cashew trees	Determined at district level (4 districts; area unknown)	Farmers groups (priority groups in each district; number unknown)	<ul style="list-style-type: none"> - Fair criteria for beneficiary targeting.
6	Planning of land reserves for medium and large scale investment	Determined at locality level (10,000ha)	Potential investors (number unknown)	<ul style="list-style-type: none"> - Consideration of PDUT, forest reserves, "zones for partial protection", existent

				DUATs, historical sites, habitats and water sources in site selection.
7	Model project for the Cluster No. 2: family-level farming for food production	Determined at district level with rough location (5,000ha in total)	Farmers associations (4 associations including 800 member families in total)	<ul style="list-style-type: none"> - Consideration of “zones for partial protection”, historical sites, habitats and water sources - Minimization of eventual forest clearance.
8	Development of agriculture special economic zone (SEZ)	Determined at district level (500ha)	Farmers, investors and other involved actors (number unknown)	<ul style="list-style-type: none"> - Consideration of “zones for partial protection”, existent DUATs, historical sites, habitats and water sources in site selection; - Minimization of eventual forest clearance.
Private Sector QIPs				
1	The expansion of poultry business	Determined at exact locations (1,000 to 1,500ha of new land)	Local employment opportunity (155 permanent workers; 640 seasonal workers)	<ul style="list-style-type: none"> - Consideration of PDUT, existent DUATs, historical sites, habitats and water sources in site selection; - Minimization of eventual forest clearance.
2	Promotion of the out-grower scheme for soybean production	Determined at district level (1,000 to 1,500ha in total)	Individual farmers as out-grower (1,000 farmers in total)	None
3	Development of a cassava processing factory and promotion of contract-farming with small-scale farmers for the production of cassava and other crops	Determined at inter-district level (somewhere in Lioma Plain, 5,000ha in total)	Individual farmers as out-grower (10,000 to 15,000 farmers in total)	<ul style="list-style-type: none"> - Consideration of “zones for partial protection”, existent DUATs, historical sites, habitats and water sources in site selection; - Minimization of eventual forest clearance.
4	Promotion of an out-grower scheme for soybean production	Determined at district level (650ha in total)	Individual farmers as out-grower (130 farmers in total)	None
5	Promotion of seed production by out-growers under contract-farming arrangements	Determined at district level (600ha in total)	Farmers associations as out-grower (3 associations including 80 farmers in total)	None
6	Tea industry revitalization project: promotion of the out-grower model for tea production	Determined at exact locations (48ha for out-grower lots; 5ha for new farm)	Individual farmers as out-grower (48 farmers in total); Tea Producer's Association	None
7	Promotion of contract-farming for crop production with smallholders	Determined at district level (area unknown)	Individual farmers as out-grower (1,200 to 1,500 farmers in total)	None
8	Establishment of the mill for poultry feed and flour production	Determined at exact locations (4ha)	Cooperative members (550) and other farmers in the region	None

Source: Study Team

Subsequently, the likely adverse impacts of each QIP on the natural and social environment have been identified, though it was practically impossible to quantify them at this stage. As shown in Table 4.2.2, the supposed environmental category and the need for EIA of each QIP have also been analyzed.

Table 4.2.2 Likely Adverse Impacts, Supposed Category and Need for EIA of each QIP

	Public Sector QIPs								Private Sector QIPs							
	1	2	3	4	5	6	7	8	1	2	3	4	5	6	7	8
1. Air pollution	-	+	-	-	-	-	-	++	-	-	-	-	-	-	-	-
2. Water pollution	-	+	-	-	-	-	+	+	-	-	+	-	-	-	-	-
3. Improper waste disposal	-	-	-	-	-	-	++	++	-	-	+	-	-	-	-	-
4. Soil contamination	-	-	-	-	-	-	-	u	-	-	-	-	-	-	-	-
5. Noise and vibration	-	+	-	-	-	-	+	++	-	-	+	-	-	-	-	-
6. Ground subsidence	-	-	-	-	-	-	-	-	-	-	+	-	-	-	-	-
7. Offensive odor	-	-	-	-	-	-	+	+	-	-	+	-	-	-	-	-
8. Sediment contamination	-	-	-	-	-	-	u	u	-	-	-	-	-	-	-	-
9. Disturbance of protected areas	-	-	-	-	u	-	-	-	-	-	-	-	-	-	-	-
10. Deterioration of ecosystem and biodiversity	-	+	-	-	u	-	-	+	+	-	+	-	-	-	-	-
11. Change in hydrologic regime	-	-	-	+	-	-	+	+	-	-	+	-	-	-	-	-
12. Soil erosion and siltation	-	+	-	-	-	-	+	+	-	-	-	-	-	-	-	-
13. Salt accumulation, other soil degradation	-	-	-	-	-	-	u	u	-	-	-	-	-	-	-	-
14. Substantial alteration of land-form, geology and landscape	-	-	-	-	-	-	-	+	-	-	-	-	-	-	-	-
15. Improper management of abandoned sites	-	-	-	-	-	-	-	u	-	-	-	-	-	-	-	-
16. Increased risk of forest fire	-	-	-	-	-	-	-	u	-	-	-	-	-	-	-	-
17. Trans-boundary or global effect	-	-	-	-	-	-	-	+	-	-	-	-	-	-	-	-
18. Influence on indigenous peoples or minorities	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
19. Detriment to cultural or historical heritage	-	u	-	-	-	-	-	u	u	-	u	-	-	-	-	-
20. Involuntary resettlement	-	u	-	-	-	u	u	u	u	-	u	-	-	-	-	-
21. Limitation of access to natural resources	-	-	-	-	-	u	-	u	u	-	u	-	-	-	-	-
22. Loss or restriction of livelihood	-	u	-	-	-	u	-	-	-	-	-	-	-	-	-	-
23. Serious change in lifestyle	-	-	-	-	-	u	u	++	-	-	-	-	-	-	-	-
24. Marginalization of vulnerable groups	u	-	-	-	-	u	-	-	-	-	-	-	-	-	-	-
25. Localization of benefits and damages	-	-	u	-	+	-	u	u	-	-	-	-	-	-	-	-
26. Aggravation of conflict of interests	u	-	-	+	-	u	u	u	u	u	u	u	u	-	u	-
27. Widening of gender inequity	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
28. Working conditions and occupational safety	-	-	+	-	-	-	+	u	-	-	-	-	-	-	-	-
29. Annoyances during construction	-	+	-	-	-	-	-	++	-	-	-	-	-	-	-	-
30. Risk of accident and harm to human health	-	+	-	-	-	-	-	u	-	-	-	-	-	-	-	-
31. Spread of infectious disease, HIV/AIDS	-	+	-	-	-	u	-	-	-	-	-	-	-	-	-	-
32. Offense against children's rights	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Supposed Environmental Category (A or B or ≤C)	≤C	A	≤C	≤C	≤C	B	A	A	B	≤C	A	≤C	≤C	≤C	≤C	≤C
Need for EIA (F: full EIA, S: simplified study, N: No need)	N	F	N	N	N	S	F	F	S	N	F	N	N	N	N	N

Source: Study Team -: No or Very Unlikely, +: Possible to Probable, ++: Very likely, u: Unknown. (Evaluated without supposing mitigation measures)

As a tentative result, 4 QIPs are supposed to be classified in Category A and 2 QIPs in Category B. These QIPs will be required to undertake either full EIA study or simplified environmental report (SER) to obtain Environmental License. Although the TORs of such studies need be approved by MICOA, DPCA and other relevant authorities, some recommendations for important aspects to be included in the TORs are given in Table 4.2.3.

Table 4.2.3 Recommendations for TORs of EIA or SER

Title	Assessment of Adverse Impacts	Measures of Avoidance, Minimization or Mitigation of the Impacts	Environmental Management Plan (monitoring, compensation)
QIPs of Supposed Category A			
Road improvements for marketing (Public sector QIP-2)	<ul style="list-style-type: none"> - (Planning phase) Historical sites; Habitats; Water sources for local community; Erosion-sensitive areas; Resettlement needs. - (Construction phase) air pollution; water pollution; noise and vibration; soil erosion and siltation; spread of infectious disease, HIV/AIDS. - (Operation phase) Risk of traffic accident. 	<ul style="list-style-type: none"> - Route planning (including borrow pits and quarries) to avoid or minimize resettlement or disturbance to sensitive areas and sites. - Road structural design to minimize erosion and accident risk. - Work methods to mitigate annoyances during construction. - Awareness campaign on public health and road safety. 	<ul style="list-style-type: none"> - Monitoring of air quality, water quality, erosion, noise and vibration during the construction. - Monitoring of accident incidence for a certain period during the operation phase. - Fair and prompt compensation based on the resettlement plan. - Proper restoration of workers camps, borrow pits and quarries.
Model project for the Cluster No. 2: family-level farming for food production (Public sector QIP-7)	<ul style="list-style-type: none"> - (Factory site selection phase) Zones for partial protection; Historical sites; Habitats; Water sources for local community; Forest clearance needs; Resettlement needs. - (Factory's construction and operation phase) Hydrologic change by irrigation; Noise and vibration; Odor; Waste disposal; Water pollution. 	<ul style="list-style-type: none"> - Factory engineering design to minimize the negative impacts on water and environment. - Fair and lawful farming contract among company, associations and farmers. 	<ul style="list-style-type: none"> - Constant monitoring and reporting of water quality and quantity by the company. - Fair and prompt compensation based on the resettlement plan. - Fair and prompt compensation for the loss of access to land and forest resources. - Agreeable modality of mutual compensation for non-compliance of the farming contract.
Development of agriculture special economic zone (SEZ) (Public sector QIP-8) <u>MICOA and GAZEDA should collaborate for smooth issuance of Environmental License for the projects in SEZ, but this does not mean that all the projects will be exempt</u>	<ul style="list-style-type: none"> - (Site selection phase) Zones for partial protection; existent DUATs; Historical sites; Habitats; Water sources for local community; Forest clearance needs; Resettlement needs. - (Design, construction and operation phase) Almost all kinds of negative impacts on the 	<ul style="list-style-type: none"> - Zone delimitation to avoid or minimize the need for forest clearance and resettlement; - Infrastructure planning and design (electricity, water, communication, road, etc.) to minimize the negative impacts on environment. - Awareness campaign on 	<ul style="list-style-type: none"> - Constant monitoring and reporting of environmental parameters by the SEZ operation unit. - Fair and prompt compensation based on the resettlement plan. - Fair and prompt compensation for the loss of access to land and forest resources.

<p><u>from EIA (Decree no.43/2009, Article 23)</u></p>	<p>natural environment; Human health and occupational safety.</p>	<p>occupational safety and health of the workers.</p>	<p>- Audit on the workers' health and safety by the companies.</p>
<p>Development of a cassava processing factory and promotion of contract-farming with small-scale farmers for the production of cassava and other crops (Private sector QIP-3)</p> <p><u>Use of cassava as raw material of ethanol is not in line with the "strategic policy on biofuel" (2009), which adopts only sugarcane and sweet sorghum for this purpose.</u></p>	<ul style="list-style-type: none"> - (Site selection phase) Zones for partial protection; existent DUATs; Historical sites; Habitats; Water sources for local community; Forest clearance needs; Resettlement needs. - (Factory's construction and operation phase) Noise and vibration; Odor; Waste disposal; Water pollution; Ground subsidence due to groundwater extraction; Hydrologic change by irrigation dam. 	<ul style="list-style-type: none"> - Land-use planning to avoid or minimize the need for forest clearance and resettlement. - Factory engineering design to minimize the negative impacts on water and environment. - Fair and lawful farming contract among company, associations and farmers. 	<ul style="list-style-type: none"> - Constant monitoring and reporting of quality and quantity of surface water and groundwater by the company. - Fair and prompt compensation based on the resettlement plan. - Fair and prompt compensation for the loss of access to land and forest resources. - Agreeable modality of mutual compensation for non-compliance of the farming contract.
<p>QIPs of Supposed Category B</p>			
<p>The expansion of poultry business (Private sector QIP-1)</p> <p><u>The company already started DUAT application.</u></p>	<ul style="list-style-type: none"> - (Definitive site selection phase) PDUT; existent DUATs; Historical sites; Habitats; Water sources for local community; Forest clearance needs; Land acquisition needs. - (Expanded factory's operation phase) Solid waste disposal; contamination of water resources. 	<ul style="list-style-type: none"> - Land-use planning to avoid or minimize the need for forest clearance and land acquisition from preceding farmers. - Proper solid waste treatment and disposal. - Proper effluent treatment. 	<ul style="list-style-type: none"> - Fair and prompt compensation for the loss of access to land and forest resources. - Constant monitoring and reporting of quality and quantity of surface water, groundwater and soil contamination by the company.
<p>Planning of land reserves for medium and large scale investment (Public sector QIP-6)</p>	<ul style="list-style-type: none"> - (Site selection phase) PDUT; Forest reserves; Zones for partial protection; existent DUATs; Historical sites; Habitats; Water sources for local community. - (Implementation phase) Implications for the resettlement and land expropriation. 	<p><i>See below.</i></p>	<p><i>See below.</i></p>

Source: Study Team

The public sector QIP-6 "Planning of land reserves for medium and large scale investment" is trying to adopt an innovative approach, so it will be helpful to provide some additional clarification in terms of environmental and social considerations.

The scope of this QIP only covers survey, delimitation and planning of the target area. Physical actions of land expropriation or involuntary resettlement, in eventual cases, are not included in the project. However, it is important to understand that the planning may result in generating implications for the need of such actions.

The expression of “available lands” in this QIP does not exactly mean truly free lands where nobody claims the right of use or its occupancy. Instead, the term only stands for the “mass of lands that can potentially be made available for investment projects relatively easier than other areas”. The existence of local people’s traditional rights of access to land, forest, water and other natural resources is never ignored. Also, in this QIP, the evaluation of “availability” of lands will not blindly follow the judgment by the government, since it is known that overlapping or negligence of existing DUATs and concessions have been reported in several cases due to insufficient coordination among government institutions.

On the other hand, it is not possible to undertake fully complete EIA within this QIP, because it remains unclear what enterprises will appear with what kind of investment projects, and how significant will be the adverse impacts. Therefore, the idea of the present QIP is to facilitate the entry of investors by providing them with basic information on environmental and social characteristics of the area, at a level of Initial Environmental Examination (IEE). When it comes to the concrete project proposal, the investor may utilize such IEE information in order to better design their projects and carry out respective EIAs with great ease and less time and cost.

The other QIPs which are supposed to be classified in Category C, or less, mostly deal with the expansion of contract farming by increasing the number of out-growers. Important considerations in these cases will be: (i) Fair criteria for beneficiary targeting; and, (ii) Agreeable modality of mutual compensation for non-compliance of the farming contract.

4.2.2 Support for preparation of Resettlement Action Plan in relation to QIPs

ProSAVANA will fully adopt the concept of RAI (Responsible Agricultural Investment). In this perspective, the QIPs of both public sector and private sector will be subject to the 7 internationally accepted fundamental principles.

There are 6 QIPs that may eventually imply the need for involuntary resettlement, though its necessity is still difficult to evaluate due to the lack of precise information. As a support for the public entities as well as private enterprises that will take responsibility of the implementation of these QIPs, standard TORs for the resettlement planning will be presented in the Draft Final Report.

The site selection should be done carefully taking into consideration the actual information about each project, so that it may generate maximum social benefits and the least environmental impact. Also, every feasible alternative should be explored in the project design.

In case that involuntary resettlement is inevitable, the resettlement activities should be formulated and implemented as sustainable development plans, providing resources for the displaced people so that they can enjoy benefit derived from the project.

The displaced people should be consulted extensively and have opportunity to participate in the planning and implementation of the resettlement plan.

The support for formulation of a resettlement plan, in accordance with the Decree no.31/2012 “Regulation on Process of Resettlement caused by Economic Activities”, requires the definition of standards, procedures and guidelines for careful planning about the treatment of potentially affected people that can be individuals, families or small communities.

In view of the above, the following standards, procedures and work steps are suggested in preparing the resettlement plan:

- a) Ensure participation of the persons or families involved in the process of involuntary resettlement, recognizing and legitimizing the organizations and leaderships;
- b) Prepare a Resettlement Plan considering that the main objective is to improve the living conditions of the affected people;
- c) Ensure compensation for the losses related to the people’s present life situation;
- d) Ensure assistance during the process of displacement and settlement in the selected places; and,
- e) Ensure, at least, keeping the current living standards (income, production, access to services), and pursue the improvement of these.

Work steps:

- a) Preliminary survey and analysis;
- b) Studies of project alternatives to minimize involuntary resettlement;
- c) Public consultations for the implementation of the QIP;
- d) Preparation of Resettlement Plan;
- e) Process and negotiation and adhesion;
- f) Compensation for the losses related to the present life situation of the persons or families, recognizing the rural residents’ customary rights of access, use and management of land;
- g) Ensuring the issuance of DUAT at the resettlement site; and,
- h) Implementation of the Resettlement Plan.

It is emphasized that all these suggestions require that the offer of new conditions (for example: lot, housing, transportation and income) should always be at least equal to the previous conditions of the involved lots: however, it is recommended to attain better conditions than before.

CHAPTER 5 PRINCIPLE OF RESPONSIBLE AGRICULTURAL INVESTMENT

5.1 Principle of Responsible Agricultural Investment

As reported in many publications, recent large-scale private investment projects in agriculture and forestry sector are facing problems of conflict with local communities, not only in the Nacala Corridor but also in whole Mozambique. Major issues include: disagreement on land delimitation, lack of transparent and significant consensus building in the consultation process, involuntary resettlement, unfair or delayed compensation, perceived threat to food security and livelihood of the community, weak compliance with investor-community partnership agreement, and so on. Mechanism of the settlement of disputes through the government's interventions also remains weak.

Under such circumstances, ProSAVANA is expected to establish a model of Responsible Agricultural Investment (RAI) in order to better spread the benefits, and balance opportunities with risks in agricultural investment projects. This will be achieved through the following approaches:

- (1) Environmental and social considerations in the grand design of the Master Plan;
- (2) Establishment of "ProSAVANA Guidelines on RAI" and its application.

In this chapter, the approach (2) is mainly discussed. It should be emphasized that "ProSAVANA Guidelines on RAI" is not going to create new, original principles which may govern the design and prioritization of components of the Master Plan, but is trying to translate the internationally accepted principles and guidelines into more specific actions to better fit the reality of the Nacala Corridor when the proposed components of the Master Plan will be put into implementation.

5.1.1 Principles of Responsible Agricultural Investment (PRAI)

A discussion note prepared by FAO, IFAD, UNCTAD Secretariat and World Bank Group "Principles for RAI that Respects Rights, Livelihoods and Resources" has been made public since February 2010. Although the proposed principles are voluntary and subject to consultation and refinement, main international agencies agreed that the following seven key principles are essentially the right ones:

Table 5.1.1 Key Principles of RAI

Principles		Specific Requirements
1	Existing rights to land and associated natural resources are recognized and respected. (RESPECTING LAND AND RESOURCE RIGHTS)	Existing use or ownership rights to land, whether statutory or customary, primary or secondary, formal or informal, group or individual, should be respected. This requires: (i) the identification of all rights holders; (ii) legal recognition of all rights and uses, together with options for their demarcation and registration or recording; (iii) negotiation with land holders/users, based on informed and free choice, in order to identify the types of rights to be transferred and modalities for doing so; (iv) fair and prompt payment for all acquired rights; and, (v) independent avenues for resolving disputes or grievances.

2	<p>Investments do not jeopardize food security but rather strengthen it.</p> <p>(ENSURING FOOD SECURITY)</p>	<p>Whenever there are potential adverse effects on any aspect of food security (availability, access, utilization or stability), policy-makers should make provisions for the local or directly affected populations such that:</p> <ul style="list-style-type: none"> (i) continuing access to food is assured; (ii) opportunities for outgrower involvement and off-farm employment are expanded to protect livelihoods and raise incomes; (iii) dietary preferences are taken into account if the mix of products grown may change; and, (iv) strategies to reduce potential instability of supply are adopted. <p>Moreover, whenever the proposed project is large enough to affect food security at the national level, project design and approval should also consider these four kinds of aggregate impact.</p>
3	<p>Processes relating to investment in agriculture are transparent, monitored, and ensure accountability by all stakeholders, within a proper business, legal, and regulatory environment.</p> <p>(ENSURING TRANSPARENCY, GOOD GOVERNANCE, AND A PROPER ENABLING ENVIRONMENT)</p>	<p>To create a proper enabling environment, policies, laws, and regulations affecting the investment climate should be benchmarked against, and brought into line with, globally accepted best practices, even as institutions responsible for implementing them are strengthened. Specific elements in this regard include:</p> <ul style="list-style-type: none"> (i) ensuring public availability of relevant information, such as land potential and availability, core aspects of prospective investments, and resource flows or tax revenues; (ii) developing the capacity of institutions that handle investment selection, land transfers and incentives to follow principles of good governance, operate efficiently and transparently; and, (iii) ensuring that an independent system to monitor progress towards a better investment climate is in place.
4	<p>All those materially affected are consulted, and agreements from consultations are recorded and enforced.</p> <p>(CONSULTATION AND PARTICIPATION)</p>	<p>Sustainability of investments in agriculture requires that such investments be designed in a participatory manner, consistent with local people's vision of development. Even in countries that already require local consultations as a precondition for project approval, the impact of such requirements is often limited by a lack of clarity on process, the nature and recording of outcomes, and ways to enforce agreements reached in the course of consultations. To make consultative processes more effective:</p> <ul style="list-style-type: none"> (i) definitional and procedural requirements in terms of who represents local stakeholders and what is a quorum for local attendance need to be clarified; (ii) the content of agreements reached in such consultations should be documented and signed off by all parties; and, (iii) methods for enforcement and sanctions for non-compliance should be specified.
5	<p>Investors ensure that projects respect the rule of law, reflect industry best practice, are viable economically, and result in durable shared value.</p> <p>(RESPONSIBLE AGRO-ENTERPRISE INVESTING)</p>	<p>In addition to conducting due diligence and project analysis, investors should be expected to:</p> <ul style="list-style-type: none"> (i) comply with laws, regulations, and policies applicable in the host country (and ideally with all relevant international treaties and conventions); (ii) adhere to global best practices for transparency, accountability and corporate responsibility in all sensitive areas; and, (iii) strive not only to increase shareholder value but also to generate significant and tangible benefits for the project area, affected communities, and the host country. <p>Where the resources in question are publicly owned, or if other public assets such as tax breaks and complementary infrastructure are being offered as incentives, government agencies have an obligation to carefully check the feasibility analysis to ensure that host countries, affected communities, and local stakeholders are all likely to benefit. National or regional bodies may have to assist states, provinces or</p>

		municipalities that are technically unable to review major projects proposed within their jurisdiction. There is also a need to integrate the proposed enterprise into broader food and development strategies.
6	Investments generate desirable social and distributional impacts and do not increase vulnerability. (SOCIAL SUSTAINABILITY)	Among others, social sustainability can be enhanced if: (i) relevant social issues and risks are identified during project preparation, and strategies devised to adequately address them; (ii) the interests of vulnerable groups and women are considered explicitly; and, (iii) the generation of local employment, transfer of technology, and direct or indirect (e.g. via taxes) provision of public goods and services is part of the investment design.
7	Environmental impacts of a project are quantified and measures taken to encourage sustainable resource use, while minimizing the risk/magnitude of negative impacts and mitigating them. (ENVIRONMENTAL SUSTAINABILITY)	Investors and government need to cooperate so that: (i) independent environmental impact analysis to identify potential loss of public goods, such as biodiversity or forests, is conducted prior to approval; (ii) preference be given to reclaiming or increasing productivity on resources already in use; (iii) the most appropriate production system is selected to enhance the efficiency of resource utilization, while preserving the future availability of these resources; (iv) environmental good practices in agriculture, processing and manufacture are adhered to; (v) provision of desirable ecosystem services is encouraged; and, (vi) negative impacts are addressed through regularly monitored environmental management plans and compensated where appropriate.

Source: Adapted from “Principles for RAI that Respects Rights, Livelihoods and Resources”, 2010

Private investors interested in agricultural development in the Nacala Corridor will be requested to comply with these principles, in addition to their internal codes of conduct and voluntary self-regulations. Government institutions, policy-makers, financing agencies, donors, local people and other stakeholders are also expected to help this process by doing their part.

5.1.2 Voluntary Guidelines

It is also advisable to refer to the following publication of FAO:

- (1) Voluntary Guidelines on the Responsible Governance of Tenure of Land, Fisheries and Forests in the Context of National Food Security (March 2012);
- (2) An informal aid for reading the Voluntary Guidelines on the Responsible Governance of Tenure of Land, Fisheries and Forests in the Context of National Food Security (May 2012);
- (3) Trends and Impacts of Foreign Investment in Developing Country Agriculture: Evidence from case studies (November 2012); and,
- (4) The State of Food and Agriculture 2012: Investing in agriculture for a better future (December 2012).

The guidelines (1) (2) are focused on the issues of land and resource rights. In connection with PRAI, the chapters 4 “Rights and responsibilities related to tenure”, 12 “Investments” and 21 “Resolution of disputes over tenure rights” draw pertinent observations.

The report (3) pointed out that international investments that give local farmers an active role and leave them in control of their land have the most positive effects on local economies and social development. In addition, it advised that acquisition of already-utilized land to establish new large farms should be avoided and other forms of investment should be considered.

The report (4) again called upon the corporate investors and other stakeholders to ensure that large-scale investments in agriculture, like the acquisition of land by private companies and funds, are transparent, accountable, socially beneficial and environmentally sustainable.

There is another currently ongoing important movement on RAI issue. The Committee on World Food Security (CFS) held its 39th session in October 2012, and agreed to develop a set of voluntary, non-binding principles for RAI, taking into account the existing principles and guidelines, through an inclusive consultation process by October 2014.

5.2 Application of PRAI for Agricultural Development in the Nacala Corridor

5.2.1 Process of Formulation of “ProSAVANA Guidelines on RAI”

As described above, the internationally accepted principles and guidelines on RAI need to be translated into actions, desirably as a balanced mixture of voluntary self-regulations and compulsory instruments. For this purpose, “ProSAVANA Guideline on RAI” will be elaborated as an annex to the “Data Book for Private Investors” by August 2013. The targeted main users include:

- (1) Mozambican government at central and decentralized levels;
- (2) Investors including enterprises and financial institutions¹;
- (3) Local stakeholders including communities (for consulting purposes);
- (4) Independent neutral players such as NGOs, civil society and academy; and,
- (5) Bilateral/multilateral donors and, to the extent possible, governments of the countries from which investment initiatives are emanating.

Table 5.2.1 shows the outline of the Guidelines in terms of structure, contents, schedule, language and contributor. Only Volume 1 will make part of the “Data Book for Private Investors”, while Volume 2 will be a separate product. In longer term, it is desirable that PRAI be incorporated by the Mozambican Government in its public policies.

¹ This may also include the “Nacala Fund” and the implementing agencies of other financial schemes to be proposed in the Master Plan. ProSAVANA Guidelines on RAI is expected to be utilized in the selection criteria of investment proposals.

Table 5.2.1 Outline of the “ProSAVANA Guidelines on RAI”

	Index	Contributor	Language	Schedule
Volume 1 for Private Investors	1. Key principles of RAI 2. Legal regulations for RAI in Mozambique 3. Recommendable codes of conduct and good practices for investors 4. Self Checklist 5. Useful links	Study team	English Portuguese Japanese	Feb.: 1 st draft April: 2 nd draft May: final draft
Volume 2 for Government Officials	1. Key principles of RAI 2. Legal regulations for RAI in Mozambique (simplified) 3. Roles and responsibilities of Government institutions 4. Actions of evaluation and supervision (+ checklist) 5. Useful links	Study team & CPI, CEPAGRI, MINAG, MICOA	English Portuguese	April: 1 st draft May: final draft

Source: Study Team

5.2.2 The First Draft of “ProSAVANA Guidelines on RAI”

The first draft of Volume 1 with 47 pages is now going through internal review by the study team and ProSAVANA Headquarter. An emphasis was given to the fact that the Government of Mozambique already has a number of laws and regulations which require obligatory compliance and respond to the most principles of RAI, if properly enforced. The contents can be summarized as follows:

- (1) Key principles of RAI
 - Partial citation of the “7 key principles (extended version)”;
 - Introduction of other relevant publications of FAO.
- (2) Legal regulations for RAI in Mozambique
 - Protected Areas, Territorial Planning, Forest and Heritage;
 - Land and EIA (Environmental Impact Assessment);
 - Involuntary Resettlement and Compensation for Asset Loss;
 - Water and Environmental Risks related to Agriculture;
 - Industrial Activity, Labor and Benefit Sharing;
 - Supervision, Penalty and Sanctions.
- (3) Recommendable codes of conduct and good practices for investors
 - 25 actions have been proposed;
 - Each action described concept, supervising or supporting institution and legal reference.
- (4) Self checklist
 - 30 items for self-check have been proposed as follows;

- Conception Stage = 2;
 - Site identification and Preliminary survey Stage = 9;
 - Assessment and Consultation Stage = 8;
 - Technical project design Stage = 7;
 - Operation Stage = 4.
- (5) Useful links
- 40 websites or reference materials have been presented as follows;
 - Principles, Guidelines and Reports issued by International Institutions = 9;
 - Mozambican Legislation, Government Institutions and their Publications = 15;
 - Outside Knowledge Sources on Good Practices and Standards = 11;
 - Official Statements on RAI in Japan = 5.

5.2.3 Mechanism of application and enforcement

For the “ProSAVANA Guidelines on RAI” to become truly effective, it is indispensable to devise good mechanisms of its application and enforcement, which might include the following elements:

- (1) To disseminate the Guidelines among a wide range of users;
- (2) To help the users’ better understanding of the Guidelines;
- (3) To strengthen the law enforcement by the Government;
- (4) To set up financial conditions to induce or restrict the behavior of private investors; and,
- (5) To create an autonomous agency with specialized functions to address RAI issues.

As for the dissemination, Volume 1 will be distributed for the participants of the investment seminars to be held in Maputo and Tokyo in August and September of 2013. Volume 2 will be distributed from ProSAVANA-Headquarter to the local governments (3 provinces and 19 districts) as well as central government institutions such as CPI, GAZEDA, MINAG, CEPAGRI and MICOA, by the end of the Master Plan study. Both volumes will also be available for download on the official website of ProSAVANA.

Any questions related to RAI from private investors will be accepted and answered by the “Support Organization for the Investment and Value Chain Development” to be established as one of the Master Plan components. For the central and local government officials in charge of evaluation and supervision of the investment projects, a series of seminars on the interpretation and utilization of the Guidelines shall be organized together with the distribution of Volume 2. Moreover, such seminar will be constantly held as an activity of the “Project for Strengthening of Supervision Mechanism on Land and Environment Law Enforcement”.

The strengthening of law enforcement requires long-term effort, and many different approaches are possible. Table 5.2.2 shows the three principle approaches to be adopted in ProSAVANA.

Table 5.2.2 Approaches to Strengthening of Law Enforcement for RAI

Approach	Details
Project for specific purpose	<ul style="list-style-type: none"> ■ Master Plan component “Project for Strengthening of Supervision Mechanism on Land and Environment Law Enforcement” (see chapter 3), which focuses on: <ul style="list-style-type: none"> - Land and DUAT issues; - District Land-Use Plan; - Environmental Impact Assessment; - Resettlement and Compensation issues; - Investor-Community Partnership Agreement; - Water use and Environmental Quality Standards; - Inspection, Audit and Sanctions.
Policy appeal	<ul style="list-style-type: none"> ■ Strong and constant request for allocation of enough budget to MICOA and other supervising institutions; ■ Legal mechanism to allow budget canalization from FUNAB to MICOA to cover the expenditure of environmental inspection services; ■ Need for public policy and legal instruments on the modality of fair and prompt compensation resulting from economic activities; ■ Need for public policy and legal instruments on the management of fertilizers²
Suggestions in RAI Guidelines	<ul style="list-style-type: none"> ■ Evaluation and Licensing stages <ul style="list-style-type: none"> - Desirable criteria of investment proposal evaluation by CPI/CEPAGRI; - Desirable criteria of DUAT application assessment by SPGC/MINAG; - Desirable criteria of EIA approval or rejection by DPCA/MICOA; - Desirable criteria of forest clearance assessment by SPFFB; - Desirable criteria of water license / concession assessment by ARA; - Recommendations for District Government on the “Administrator’s Opinion” on DUAT application process and the approval of Resettlement Plan. ■ Monitoring and Supervision stages <ul style="list-style-type: none"> - Key points of project and land-use monitoring by CPI/CEPAGRI/MINAG; - Key points of environmental monitoring and inspection by MICOA. - Information disclosure on investment project, DUAT, EIA and other documents.

Source: Study Team

It is also desirable that “ProSAVANA Guidelines on RAI” could be utilized by the financing agencies, including Nacala Fund or other financial institutions which may handle the loan schemes for private investors under ProSAVANA, in the selection process of investment project proposals. One alternative is to provide favorable conditions in terms of project finance for those investors who are committed to comply with RAI principles. Another alternative will be, on the contrary, to reject any proposal which does not meet certain requirements of RAI principles. However, such control by financing agencies will not reach those investors who can implement the project by their own capital or through other financial sources outside ProSAVANA’s scope.

² “Regulation of Fertilizer Management” was approved by the Council of Ministers in Feb. 2013, but not promulgated yet.

Finally, the establishment of an autonomous agency with specialized functions to address RAI issues, or at least as one of the units under “ProSAVANA Implementing Body”, will deserve discussion. The effectiveness of the application and enforcement of the “ProSAVANA Guidelines on RAI” will be influenced quite a lot by the existence or lack of such specialized unit. If such agency or unit is going to be materialized, the following points should be discussed with special attention: (i) objective; (ii) scope; (iii) geographical coverage; (iv) legal competence and executive power; (v) revenue and expenditure; and (vi) duration (permanent or temporary). Overlapping of functions with other government institutions should be avoided; rather, this agency or unit is expected to contribute to strengthen and complement the government institutions by providing less bureaucratic services from neutral standpoint. One feasible recommendation is that this agency or unit will not possess legal power to impose sanctions or penalties but will be authorized to carry out independent monitoring, request the disclosure of any necessary documents or information, and support the inspection activities by the government officials.

5.3 District Meetings and Stakeholder Meetings

5.3.1 Supporting the District Meetings

(1) Background and Objectives of District Meetings

Through the several meetings conducted by ProSAVANA-PD at provincial and district level, Mozambican counterparts of DPA Nampula planned to conduct the dissemination of ProSAVANA Program at local government and farmers levels. Unfortunately, their proposal was not approved because of shortage of government budget. At the Third JCC of ProSAVANA in December 3, 2012, the importance of social communication was confirmed.

In order to conduct the district meeting for the dissemination of ProSAVANA Programs and explanation of the agricultural development master plan outline, the Japanese Study Team of ProSAVANA-PD decided to support the Mozambican counterparts after the Overall Picture was prepared by ProSAVANA-PD in November 2012.

(2) Implementation Plan of District Meetings

The district meeting is organized and conducted by Mozambican counterparts. The explanation of ProSAVANA program, outline of overall picture of agricultural development and answer to questions are made by Mozambican counterparts. The member of Japanese Study Team supplemental answer to questions, if necessary.

Through the discussion among the Mozambican counterparts to start the implementation planning, it is proposed that the discussion meeting shall be conducted at 3 groups:

- 1) District government consultative council (district government officials including SDAEs, posts administrations, extension workers, traditional leaders, etc.)

This group as “voice” of Mozambican Government in local level must be prepared to answer to questions that arise from the civil society and local people. Also the district government is one of the most important stakeholders for implementation of Agricultural Development Master Plan.

2) Local farmers and its representatives

Farmers are the largest beneficiaries/stakeholders in the agriculture development. They are mostly supported by extension workers of SDAE and NGOs. The way of approach to this group is quite different, starting from the fact that the dissemination must be done on their own language.

Dissemination meeting shall be organized by local government (SDAE) under support of DPA Province and ProSAVANA-PD/PI. Representative of farmers/associations will be selected by the extension groups (SDAE and NGOs). Participation is opened to any stakeholders, but total participants set to be around 60, because of the venue and discussion.

3) Civil Societies

This group must be addressed accordingly. Explaining the ProSAVANA-JBM and be prepared to answer their criticisms based on less information, and details of the project.

Civil Society Platforms are formulated at the provincial level. It is agreed that one discussion meeting on ProSAVANA program will be conducted with representatives of each district platforms at Nampula. It will be held at DPA Nampula on March 21 2013 under the participation with ProSAVANA-HQ.

(3) Progress of District Meetings

As the first district meeting, the meeting with farmers in Ribaua conducted on March 19, 2013. The schedule of district meeting has been fixed at all districts in Nampula and Zambezia provinces, and they will be completed by April 9, 2013. The meetings in Niassa Province are not fixed yet, so they will be conducted in May to June. As of March 12, 12 meetings were conducted as shown in Table 5.3.1.

In some district meeting

Table 5.3.1 District Meeting Schedule and No. of Participants

Province	District	Meeting with Consultative Council		Meeting with Farmers	
		Date	Participants	Date	Participants
Nampula	Monapo	29-Mar	-	29-Mar	-
	Muecate	14-Mar	-	27-Mar	-
	Mecuburi	22-Feb	43	4-Mar	76
	Meconta	28-Feb	34	5-Mar	104
	Mogovolas	3-Apr	-	3-Apr	-
	Rapale	21-Feb	46	1-Mar	61
	Murupula	1-Mar	39	13-Mar	-
	Ribaua	9-Apr	-	19-Feb	88
	Lalaua	15-Mar	-	15-Mar	-
Zambézia	Alto Molocue	27-Feb	15	27-Feb	78
	Gurue	4-Mar	13	28-Feb	63
Niassa	Cuamba	-	-	-	-
	Mecanhelas	-	-	-	-
	Mandimba	-	-	-	-
	Ngauma	-	-	-	-
	Majune	-	-	-	-
	Chimbonila	-	-	-	-
Sanga	-	-	-	-	
Total			190		470
Average			31.7		78.3

Note: * Members and staffs of the Study Teams are not counted.

- : not yet specified or conducted

Source: Study Team

could not implement at the district consultative council but conducted at the meeting of district government officials.

Up to now, total analysis are not complied, but the common issues expressed by farmers are 1) lack of market access, 2) lack of access to agricultural inputs (seeds, tractor) and, 3) no access to agricultural credits, 4) poor road to market. On the other hand, the district officials expressed poor social infrastructure including local road, adult education and specific issue in region such as low productivity of tea production. These results of meetings will be examined to finalized the agricultural development master plan by the Study Team. And they will be described in the draft final report which will be issued in August 2013

5.3.2 Supporting the Stakeholder Meeting

In separately with the district meetings, two stakeholder meetings were conducted as shown Table 5.3.2. These stakeholder meetings are organized by Mozambican counterparts, and the Japanese Study Team for ProSAVANA-PD support the explanation and answers to questions.

The first stakeholder meeting was prepared on the explanation of work plan of the agricultural development master plan based on the draft Work Plan in Maputo, Nampula, Lichinga, Quelimane, Alto Molocue in April 2013.

The second stakeholder meeting was conducted on the draft Report No.1: overall picture of the development plan in Nampula and Maputo in November 2012.

The third stakeholder meeting is planned on the quick impact projects on March 18 and 22, in Maputo and Nampula, respectively.

Table 5.3.2 Number of Participants in the Stakeholder Meetings

Round	1 st meetings (April 2012)				2 nd meetings (November 2012)		3 rd meetings (March 2013)	
Material	Inception Report				Interim Report 2		QIP Report	
Place	Nampula	Lichinga	Quelimane	Alto Molocue	Nampula	Maputo	Nampula	Maputo
Farmer	2	0	0	8	4	0		
Private enterprise	10	9	2	2	6	8		
Public organization	28	28	6	7	28	22		
NGO and Donor	3	5	0	4	3	10		
Unknown	3	1	2	12	0	0		
Sub-Total	46	43	10	33	41	40		
Grand Total	132				81			

Source: Study Team

* Members and staffs of the study teams are not counted.

CHAPTER 6 FURTHER STUDIES

6.1 Flowchart of Reporting

According to a series of discussions on the triangular work plan of the Study, the following four (4) kinds of report, namely Report 1, Report 2, Report 3 and the Final Report, shall be prepared during the study. The reporting procedure is illustrated in Figure 6.1.1.

- (1) Report No. 1: Overall Picture
 - Agriculture in the study area (potential and constraints)
 - Zone-wise agriculture development strategy and goals
 - Sector-wise agriculture development strategy
- (2) Report No. 2: Quick Impact Projects
 - Zonal goals and cluster development strategy
 - Quick impact projects (QIPs)
- (3) Report No. 3: Draft Master Plan Report & Preliminary Data Book for Investors (to be submitted middle of August 2013)
- (4) Final Master Plan Report & Data Book for Investors (to be submitted middle of October 2013)

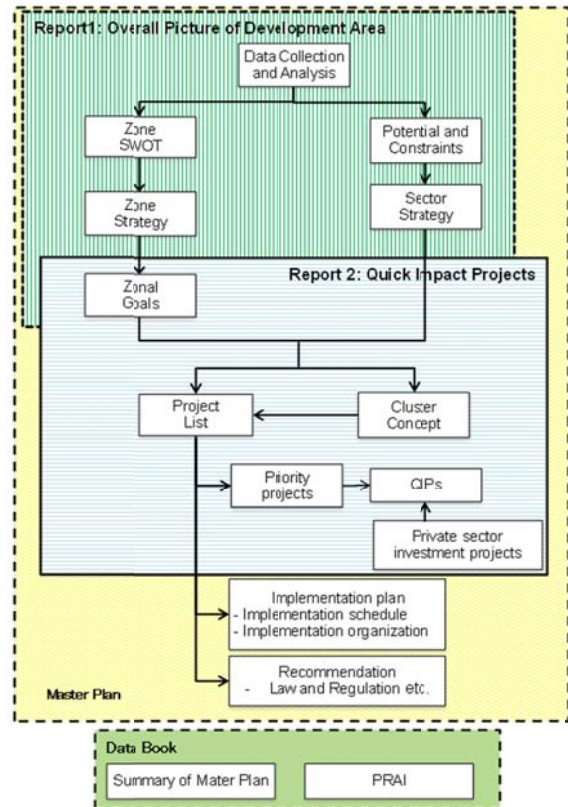


Figure 6.1.1 Flowchart of the Reporting

6.2 Additional Field Survey (March to June 2013)

6.2.1 Continuation of District Meetings

As stated in Sub-chapter 5.3, all of district meetings in Nampula and Zambezia Provinces will be completed by the middle of April by the counterpart of 2 provinces under the support of Japanese PD Study Team. The remained 7 districts in Niassa Province will be completed during the next field Study between May to June. The Study Team will continue supporting the Mozambican counterparts. These results will be compiled and analyzed to confirm the final master plan and details will be attached to the draft final report.

6.2.2 Additional Study of 5 Districts

(1) Collection of Data and Information of Additional 5 Districts

Collection of data and information of additional 5 district will be conducted as same as original 14 districts through provincial DPAs and SDAE of districts.

These present additional data / information will be analyzed and compiled to the present conditions of the original 14 districts as shown in Chapter 3 of Interim Report (1) for the draft Final Report.

(2) Field Survey in 5 Districts

The field survey and interview survey in the additional 5 districts will be conducted by the Study Team from March to June 2013. Field survey also will study the possibility of applying formulated Master Plan component projects and QIPs in these new districts.

6.3 Output 4: Preparation of Investment Data Book for Agricultural Sector of Nacala Corridor Area and the Holding of Investment Seminars (April to August 2013)

6.3.1 Preparation of Investment Data Book for Agriculture Sector of Nacala Corridor Area

The Investment Data Book will present an overall picture of the agriculture/agribusiness sector in the Nacala Corridor, with a summary of the Agriculture Development Master Plan, including a list of proposed projects, future potential for agriculture and agribusiness development, regulations and necessary procedures for starting agribusinesses, and other related information. The Data Book will be prepared by a joint effort with the both teams with support from the Mozambican counterparts from CPI, CEPAGRI, and MINAG. It is expected that a draft will be compiled by the end of July 2013, while the final product will be printed in August of the same year, following the completion of the editorial work and graphic layout. A tentative outline of the Data Book, including possible contents, is set out in Table 6.3.1.

Table 6.3.1 Tentative Outline of the Investment Data Book

1. Background (2 pages)
- General explanation of agriculture development in the Nacala Corridor ◇ Brief summary of ProSAVANA JBM
2. Current Status of Agriculture/Agribusiness in Mozambique and the Nacala Corridor (10~15 p.)
- Geographical and agro-ecological features - Agricultural activities (amount of production, product supply chains, export volume and sector trend, etc.) - Agribusiness investment (existing businesses, current investment trend, etc.) - Agricultural input supply, logistics, financing and irrigation facilities - Government structure for supporting the agriculture sector (MINAG) ◇ Organizational structure, roles and responsibilities, and agriculture development policy

3. Summary of Master Plan and Future Potential for Economic Development in the Nacala Corridor (5~10 p.)

- Overall strategy for agriculture development in the Nacala Corridor (target, timeframe, etc.)
- Cluster and zoning development strategy proposed in the Master Plan
- Related economic development activities (Nacala port rehabilitation, road rehabilitation [Nacala and Pemba Corridor], railway rehabilitation, natural gas and mining projects, manufacturing of chemical fertilizers, etc.)
- Trends in economic development of the Nacala Corridor over the past years and current forecast
- Responsible Agriculture Investment (basic principles of RAI for agriculture/agribusiness development)

4. Agriculture and Agribusiness Potential (10~15 p.)

- Demand for major crops in the local market and production forecasts
- Import substitution potential for agricultural products
- Comparative advantages of agriculture products in the Nacala Corridor
- Details of the development direction of each cluster and potential crop
- Priority/potential areas for large/medium scale agribusiness investment
- The ProSAVANA Special Economic Zone concept (potential area, investment incentives, etc.)

5. Potential Agribusiness Models with Small-scale Farmers (5~7 p.)

- Experiences of contract farming with small-scale farmers in crop production
- Potential business models for the involvement of small-scale farmers in commercial agribusiness

6. Regulations, Policy and Investment Procedures (10~12 p.)

- Land Title (DUAT) (application procedures, timeframe, other related information)
- Investment license (CPI) and Foreign Direct Investment licenses (the Central Bank)
- Investment incentives for the agriculture/agribusiness sector
- Roles and responsibilities of governmental institutions in agribusiness investment

7. Limitations (5~7 p.)

- Policy, regulation and taxes
- Limiting factors: i) infrastructure: ii) access to land: iii) availability of skilled labor: iv) input supply (high quality seeds, fertilizers, machinery, spare parts, etc.): v) agricultural financing: etc.
- Government subsidies provided to agriculture products
- Current concession arrangements made by the government (cotton, tobacco, etc.)

8. Potential Projects proposed in the Agriculture Development Master Plan for the Nacala Corridor (5~7 p.)

- M/P component projects and QIPs (especially related to the supporting of agribusiness investment)
- Outline of the agricultural financing scheme (special loan (soft loan) scheme for small/medium agribusinesses, and the Nacala Fund for large/medium agribusiness investment)

9. ProSAVANA implementing body (tentative) (3~5 p.)

- Will include details (organizational framework, specific roles and responsibilities, staffing, etc.) on the ProSAVANA implementing body if it is confirmed by July 2013.

Annex

- Details of RAI procedures and checklists
- Directory of relevant government offices (CPI, CEPAGRI, DPA, SPGC, MICOA, etc.)

- List of agribusiness companies operating in the Nacala Corridor

6.3.2 ProSAVANA Guideline on RAI

As stated in Chapter 5 of this Report, ProSAVANA Guideline on RAI will be prepared Volume 1: Guideline for Private Investor and Volume 2: for Government Officials by August 2013. Only Volume 1 will make part of the Data Book for Private Investors.

By the end of April, the second draft of Volume 1 (for private investors) and the first draft of Volume 2 (for government officials) will be prepared in respective languages. The final draft of both volumes will be ready by the end of May. After that, Volume 1 will be integrated into the “Data Book for Private Investors” while Volume 2 will become a separate product. Finalization and distribution of the “ProSAVANA Guidelines on RAI” are scheduled to be around August and September 2013.

6.3.3 Holding Seminars for Private Investors

An Investment Seminar shall be held with private companies. In the seminar, the Master Plan and the Investment Data Book for agricultural development in the Nacala Corridor will be explained, and the Investment Data Book shall be distributed. The seminar will be held one day in Mozambique and one day in Japan respectively. The seminar in Mozambique will be held at the same time as the explanation of Draft Final Report in August 2013. On the other hand, the seminar in Japan will be held after the explanation of the Draft Final Report is completed during waiting for the comments on the Draft Final Report from MINAG in September 2013. The number of attendees is expected to be about 50 people in both seminars. At present, it is expected that a few administration officials in Mozambique will be invited to the seminar in Japan.

6.4 Preparation of Draft Final Report (up to August 2013)

6.4.1 Preparation of Draft Final Report

The Master Plan is finalized by feedback of newly found through examination of priority agricultural development plans and QIPs. In particular, in order to maintain consistency between the Master Plan and QIPs, details of QIPs will be reflected in the Master Plan such as detailed activities plan, implementation schedule, result of business model analysis, recommendation for strengthening the implementation structure, etc., which will be examined during the preparation of implementation plans for selected QIPs.

6.4.2 Finalization of Agricultural Zoning, Agricultural Development Plan and QIPs' in the Master Plan

Agricultural zoning determined in Chapter 2 of this report, already included the GIS information of additional 5 districts. And the Agricultural Management zoning together with district-wise Agricultural zoning were determined. Their results shall be confirmed in each district through the field survey. If there is some discrepancy found with the present zoning, it shall be modified accordingly.

6.4.3 Master Plan Evaluation

The Master Plan (Agriculture Development Plan in the Nacala Corridor) to be developed, should be evaluated in terms of its validity. The Master Plan is not a long list of the proposed projects, is considered as an aggregate of projects needed to achieve the goals of the Master Plan, and the goals will be achieved if all projects are implemented. Therefore, the project evaluation of the Master Plan will be carried out comprehensively and transversely for multiple projects that make up the Master Plan, and to make a judgmental decision of overall validity of the implementation of the Master Plan. In consideration of above premises, the evaluation of the Master Plan will be carried out with 4 approaches as follows.

(1) Cost and Benefit Analysis

Even though it is difficult to quantify with accuracy, it is still worthwhile to try to figure out the contribution of the Master Plan to the regional economy. Each component of the Master Plan consists of measures to solve various issues raised in the sectors of agriculture, and such measures are strongly related with each other. In consideration the above issues, it will be considered that the increase of local agricultural production and added value of products will be regarded as the net benefit of the Master Plan. Those values will be estimated approximately for major crops in the evaluation.

(2) Qualitative Analysis of Component Project

Most of the component projects of the Master Plan cannot obtain the quantitative outputs. After these outputs are combined, the quantitative outputs can be realized. Therefore, components projects are evaluated by qualitative analysis. The qualitative analysis will be conducted by five viewpoints of DAC criteria namely, "Relevance", "Effectiveness", "Efficiency", "Impact" and "Sustainability".

(3) Analysis of Socio-economic Impact of Cluster Development

In the Master Plan, several agricultural cluster development concepts are proposed and model/pioneer project for each cluster development are formulated as component projects of the Master Plan. The socio-economic impact of cluster development will be analyzed by model of each cluster development and it will be expanded to the Nacala Corridor Area.

(4) Strategic Environmental and Social Assessment

Strategic environmental and social assessment approach, which is described in the following section, will be applied in order to evaluate validity of the Master Plan from the aspect of environmental and social issues.

6.4.4 Strategic Environmental Assessment

Based on the Draft Master Plan, the Strategic Environmental Assessment (SEA) was conducted (ref. Sub-chapter 4.1 of Draft Report on Data Collection and Analysis of Agriculture in Nacala Corridor and Drawing of Overall Picture of Development Plan, November 2012).

After completion of draft Master Plan review including QIPs planning and study results of the additional 5 districts survey, the previous SEA shall be reviewed.

It is expected that Draft Final Report would include the screening and scoping of the “platform projects” and “pioneer/model projects for cluster development” in the same manner as has been applied to the QIPs in the present report (see Chapter 4.2). Moreover, a strategic assessment of the grand design of the Master Plan will be conducted from holistic viewpoints as follows:

- (1) *Review and update of the qualitative comparison of likely adverse impacts among the Master Plan and its alternatives (including “zero option”):* some national plans, strategies and regulations have been developed recently, and these shall be taken into consideration.
- (2) *Extended stakeholder analysis:* a correlation matrix of the stakeholders and the Master Plan projects will be developed in terms of their susceptibility to the impacts and consultative influence in the decision-making process.
- (3) *Recommendations for the core strategies of the Master Plan that imply significant and/or irreversible adverse impacts:* a series of request for modification or reconsideration of the core strategies will be developed in favor of the safeguard of natural and social environment of the Nacala Corridor, focusing on: (i) land issue, mainly in terms of investor-community relationship and desirable distribution of farm sizes in the future; (ii) forest issue, mainly in terms of admissible level of forest clearance for agricultural purpose and compensation mechanism such as “Forest Initiatives Project”; (iii) food and nutritional security; (iv) maximization and sharing of benefit, mainly in terms of fair beneficiary targeting, concern about widening of disparity among different classes of farmers, and, socially fair and acceptable mechanism of benefit sharing between individual farmers and corporate farms; and, (v) policy appeals from ProSAVANA’s standpoint.
- (4) *Incorporation of the results into the SEA undertaken by PEDEC study team.*

6.4.5 Explanation and Discussion on Draft Final Report

All the results of the Study, from the beginning of the Study to finalization of the Master Plan, are described in the Draft Final Report. (English Portuguese and Japanese) The report will be explained in detail with related institutes in Mozambique, other donors, the private sector and NGOs. The comments stated in the explanation and discussion meeting will be recorded in the minutes of meetings and agreed on by the MINAG. Moreover, it is noted in the minutes of meeting that additional comments from Mozambican side should be submitted in written form by the required date.

6.5 Preparation of Final Report (October 2013)

The comments on the Draft Final Report of the MINAG, JICA, ABC and output of investment seminars will be reflected in the Final Report. The Final Report will be submitted MINAG through official channel of JICA/ABC