Development of smallholders’ production and supply chains in Kenya

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1. Introduction

1.1 Background

Market access, pro-poor growth, private sector involvement and social responsibility are central themes in the current development debate. A range of initiatives are taken to improve the engagement of small producers in new market opportunities. However, relatively few initiatives seem to be able to effectively support the poor to participate in market-oriented production and export supply chains in a commercially viable way.

Production, processing and export of horticulture products are such market opportunities for small producers in Kenya that can contribute to income and employment generation for rural poor households. Over the past years, food quality and safety have become major issues on the European market and stringent standards and regulations have been set for many product groups. This has reduced export opportunities for smallholders and thereby reduced their opportunities to fight poverty and obtain a sustainable livelihood.

In the period 2006-2008 the project ‘Development of appropriate processing technology for horticulture export by smallholder farmers’ (financed by WSSD funds from the Dutch Government) has given a number of Kenyan and Dutch public and private partners the opportunity to develop together a concept for a supply chain that sources from smallholder farmers for the modern food processing industry that optimises use of solar energy. This pilot project resulted in a business model which successfully includes smallholders production with central processing for high value product markets. The pilot was implemented with one product (African Bird Eye Chilli) and including 800 smallholders. In order to explore the potentials of a wide roll-out of this model it is necessary to obtain experiences in up-scaling the business model with larger number of smallholders and for a wider range of products and processing techniques and markets.

Despite the favourable raining pattern and a well developed tourism sector, the coastal Districts are among the poorest in Kenya with a high incidence of poverty. Even though the area is very fertile, subsistence farming is the most common practice. So far, agriculture at the coast has failed to flourish due to scarce market opportunities for the domestic market and lack of export companies sourcing produce from the area on a regular basis for the export market. Therefore, the system of contract farming is still very rare and farmers producing horticultural crops for export have to sell at marginal rates to brokers which are increasingly having problems to fulfil all requirements for export certification. For the production of horticultural crops, the farmers have been dependent on local knowledge which is often below the required standard to achieve high quality produce at good productivity rate.

The coast has a high potential for the supply of horticultural cash crops due to high soil fertility, good climatic conditions, proximity to Mombasa and willingness of farmers to work hard and collaborate in cooperative manner. The tourist industry at the coast is well developed creating a potential high-value domestic market. The
demand for horticulture crops for export to the EU and other international markets is high and the prospects promising in particular in niche markets.

In 2001, the Coast Development Authority (CDA) was contracted by FAO to start up Farmer Field School (FFS) networks. This resulted in the rather successful Kilifi Farmer Field School Network (KIFFNET) consisting of more than 100 FFS groups. Later several other FFS networks were started in other areas in the Coastal Districts. However, as the networks failed to engage in joint commercial activities, the networks have in general weakened. Equator Products Ltd, has started a pilot project for the production of African Bird Eye Chillies with Kiffnet groups in the beginning of 2008. Currently it has expanded to about 250 Self Help Groups (SHGs) in Kilifi, Malingi and Lamu District. Over 4,000 farmers are planned to be contracted by the company and starting production by the end of 2008.

The direct intermediate target groups of the project are KIFFNET, CDA and Equator Products. The ultimate target groups are however national policy makers, development organizations, private sector organizations and producers networks/groups engaging in developing international and regional value chains including smallholder producers.

**Project goal**
The goal of the project is to contribute to poverty reduction and improvement of livelihoods in the Coast Province Kenya through improved and sustainable access of smallholder horticulture producers to export markets of processed horticulture products.

**The purpose of the project is:**
- Development of a sustainable business model for smallholder-based processing and marketing of a range of horticultural crops based on networks of farmers production groups;
- Engage at least 5,000 smallholder producers in competitive horticulture processing export supply chains leading to a sustainable improvement of their livelihoods;
- Formulate public-private recommendations for up-scaling this business model in East Africa

The project will be implemented over a period of 2 years: 2009 – 2010.

**1.2 Project approach and expected outputs**
The project will apply an action research and development approach which entails:
- Distinct intervention strategy re-engineering value chains for enhancing the pro-poor development perspective in the specific case and to learn about this intervention for use in other circumstances;
- Explicit aim to re-configure the institutional arrangements between horizontal organisations, in particular producer organisations and networks, and the vertical column of (coordinated) commercial transactions;
• Locating the value chain in its institutional context and incorporating strategy and policy inputs from this environment that impact on the functioning of the value chain configuration;
• The implementation will be guided by a committed implementation coalition comprising national and/or international partner organisations.

Besides action research on the case of Equator Products in Malindi and Lamu, the research will also examine other real-life cases in the coastal area of Kenya or East Africa, and will carry out in-depth desk research on existing business models from literature. The focus will be on small-holder based horticulture processing value chains.

Expected results of the project by the end of 2010 are:
• Case study of action research with over 4000 farmers engaged in processing export chain;
• Sustainable and competitive business models for smallholder-based processing and marketing of horticultural crops developed, tested and described;
• Overview of lessons learnt during roll-out of smallholder-based business model for large numbers of small holders and various types of processed products.
• Papers and policy briefs on recommendations for public and private partners to facilitate smallholder linkages to international markets.
• Workshop(s) targeting public and private partners in East Africa engaged in development and implementation of smallholder horticulture processing supply chains.

1.3 Objectives and expected results inception mission

The inception mission was implemented in the period February 1 – 6, 2009, in the Malindi and Lamu coastal regions of Kenya. The objective of the mission were to:
• explore and discuss the current supply chain challenges that occur with various stakeholders involved in the Equator Products (EP) case, and
• to formulate a detailed activities work plan for the project in 2009.

The mission was carried out by André de Jager of LEI (project leader) and Hans Nijhoff of CDIC.

The mission was carried out at a time when a serious draught has affected many regions in Kenya, among others some of the Coastal Districts. Specifically for to EP case, the timing of the rains are important since they will define when transplanting from nursery to field takes place, and thus have an effect on the whole production cycle. This once again shows the unpredictability of (investing in) Africa’s agriculture: the draught of 2008 resulted in lower yields, in farmers leaving their fields and villages to search for work in other parts of the country, and in farmers breaking agreed upon outgrow contracts to sell their produce to traders due to a need for direct cash to buy food.

This report provides findings and conclusions of the inception mission and suggests a work plan for this first year of the two-year BO project ‘Development of smallholders’ production and supply chains in Kenya’. The main expected result of the project is to
arrive at the development and testing of a business model that enables smallholders in East Africa to engage in competitive processing/export supply chains.

1.4 Project components

This report provides insight in the findings of the field survey on the case of Equator Products (EP) in Malindi and Lamu Coastal Districts in Kenya. The project consists of four components, each component represents a chapter in this report.

The first component of the project is to arrive at a detailed description of the EP business model. It will describe the critical issues for successful outgrow activities – such as the design, constraints and challenges of EPs business model, important preconditions, and the institutional setting. This component includes the backing-up of the business model, i.e. database management of crucial information to enable better informed planning and activities. The EP database will serve as the basis of knowledge sharing. Based on the inception mission an initial description of the EP business model as well as of critical issues identified so far are provided in chapter 2.

The second component of the project involves actual engagement in the further development of the business model. Based on field surveys, stakeholder interviews and plans of EP management, actual intervention strategies to re-configure and/or strengthen the business model will be identified. Actual support is provided realizing these intervention strategies for instance through provision of training to key staff of participating producer organizations, aimed at developing the overall capacity of these organizations to scale-up and develop into well-organized chain partners engaging in competitive processing/export supply chains. The impacts of the interventions in the business models will be monitored using an innovative ongoing monitoring and evaluating approach. Based on the survey carried out in the inception mission suggestions and details for technical support are provided in chapter 3.

The third component aims to conduct an inventory of similar business models in East Africa. It will compare models with the EP business model and provide an analysis and recommendations. The focus is on the critical issues and/or best cases concerning the engagement of smallholders in competitive processing/export supply chains. The inception mission did not result in any inventories on this component. Some suggestions of linkages to other projects are made in chapter 4.

The fourth component entails learning, analysis and dissemination. Based on the results of the first 3 components analysis of results and lessons-learnt will be implemented and disseminated. Chapter 5 will briefly describe the plans for this component.

Finally, chapter 6 provides a work plan and budget for activities and experts involved for 2009.
2. EP business model, analysis of critical issues

2.1 Background
In a previous WSSD project a proto-type business model was developed with Equator Products (henceforth, EP). This model was based on EPs processing of African Bird Eye Chilli’s, involving 1,000 smallholders in the Machakos District in Kenya. For a further development and wider roll-out of this model the inception mission focused on preparing for wider action research on the business activities of EP and its chain partners in the coastal regions of Malindi and Lamu. Findings from the mission that are described in this chapter and form the basis for additional action research and reporting. The goal of this chapter is to arrive at a well-documented case study on EPs (and possibly other processors’) activities, with over 4,000 smallholders engaged in a processing export chain(s).

2.2 EPs collection, processing and sampling activities
EP processing and field staff meets once per week. Present at these meetings are the general manager, production manager and EPs six extension officers which are jointly responsible for the field activities in the Lamu, Kalifi and Malindi production areas. The main focus of the meetings is on production trends and staff activities (looking back and planning ahead per week).

Collection
For collection of its produce EP follows fixed collection routes. These are set in advance and communicated from field staff to the farmers. For example: Monday to Malindi, Tuesday to Kalifi, Wednesday to Lamu. The truck arrives at a set time in the morning and brings a quality expert. Farmers will already have arrived at the collection points. The first grading is done on the spot, at group level, and is overseen by the quality expert. Based on issues such as colour and weight a certain percentage is rejected. On average only about 5% gets rejected after first grading. The remaining 95% of the produce is the weighted and recorded, still at group level. The colour of a card (green, blue, orange) represents the sourcing village.

Processing
After all produce is loaded on the truck the quality expert informs the factory on the amount of kg’s and expected time of arrival. Upon arrival at the factory, produce is weighted once again and crates with produce are lined up in rows representing the groups. A sample is taken from each crate of each group and a report made per group, indicating the determined quality. These reports are also useful for the field staff - if a sampling report indicates ‘too many orange peppers’ farmers may have harvested the crops too early. The produce is then measured according to the required kg’s per tray. Each tray receives a number and is then directed to the cold store (specific code) or the dryer (different code). Whether produce is stored or processed depends on whether the volume of that day is sufficient to fill the dryer.

Sampling
After drying the processed produce is laid out on cleaned metal tables for recording. Based on the cards per tray the produce is double-checked on quality before final
bagging. This quality check may result in three types of reject: pre-mature (orange), over-ripe (black), and broken or dirty. Here a correction (on final payment ?) is done and feed-back forms to farmers are prepared. The final bagging process involves manual grading on the steel tables and bagging the produce at group level. Two final samples of 50 grams each are taken – one for own records and one for the laboratory. With a container containing 190 bags, the mix of these 190 samples times 50 grams then represents the ‘master representative sample’.

**2.3 EPs supply chain challenges**

At 2 kg of produce per farmer per week, and with 2,000 farmers supplying the fresh African Bird Eye Chilli’s, currently a total of 4 tons of dried exportable produce is achieved per week. This is just below EPs breakeven calculation, which requires 5 tons per week. One of the main challenges for EP is to arrive at a business model that ensures this crucial break-even volume. Volumes above 5 tons per week are expected to result in a quick increase in profitability of around 20-30%. In 2008 EP exported a total volume of 60 tons. In 2009 around 200 tons of export is foreseen. To achieve the
required volumes, the model must effectively links the actors and activities of its supply chain. (figure 1: Project challenges: actors and activities). A model that enables EP to link to thousands of smallholders, making use of their existing organizational structures. EP identified three farmer organizations (Kiffnet, Laffsnet, and Codo) in which smallholders are organized. Through capacity development EP aims at organizing a sustainable relationship with the organizations to ensure 5 tons of produce or more per week.

The capacity building program focuses on four components: training on pre-harvest and post-harvest techniques, as well as on business and group dynamic related issues. Other challenges (and investments) of EP include organizing the logistics of weekly collection of produce from each of the organizations’ farmers, and on-site field inspections and data collection among farmers by its extension officers. Field inspections serve the purpose of identifying problems and assess needs among farmers, providing input for a more tailor-made training program. The collected data meanwhile is meant to support EP in projecting and planning its processing activities and export planning. The data is stored in a database, and EP wishes to define how this data, as part of its monitoring system, can be used for more precise projections.

2.4 EPs supply chain partners

EP has contractual arrangements with smallholders from three organized farmer organizations: Kiffnet, Laffsnet and Codo. Kiffnet is situated about one hour drive from EPs Malindi-based processing plant, while Laffsnet and Codo are based more to the north, towards the Somali border, at about 3-4 hours drive from Malindi. The inception mission included field visits to each of these organizations. Stakeholder meetings were held and short field trips organized.

These meetings were attended by a team of the organization’s facilitators and board members (10 Kiffnet participants, 20 Laffsnet participants and 10 Codo participants). The goal of the meeting was to see how outgrowers’ activities can be improved, how they can be expanded, and how a training program may be designed to support this. Chapter 3 of this report provides more information on the training elements of these discussions, while the next chapter provides an initial summary of critical issues of EPs business model.

2.5 Critical issues of the EP business model

Based on the stakeholder interviews with Kiffnet, Laffsnet, and Codo representatives the project has made a start with the identification of critical issues. For this moment the following clusters have been established and will be described below:

1. Selecting farmer group facilitators
2. Organizational and technical capacities
3. Incentives for farmers to switch
4. Competitive position to attract new farmers
5. Organizing access to finance

This first ‘drop’ of issues provides a starting point for the project team to further identify, cluster and work towards a set of comparable critical success factors. Each of
the five clusters describe in the (almost) exact wording what has been said, and indicates in which meeting these remarks were made. It is still a ‘drop’ of clustered remarks which may now be used to come to more specific critical issues, including their relation to the design, constraints and challenges of EPs business model, as well as important pre-conditions and the institutional setting.

Critical issue 1: selecting farmer group facilitators

*Kiffnet meeting:*
- Representatives farmers are scattered and visiting them takes too much time. More facilitators are needed.
- Selecting facilitators should be based on having been present in past FAO FFS training. Yet some facilitators are selected from self-help group structures that have no experience with agriculture. EP can not work with all existing groups – expertise in agriculture is required.
- Board and Zonal officers will assist in a proper selection of facilitators and use the existing structure where possible. The zonal office and zonal officers must take a leading role. Whereas the groups select the facilitators, the zonal office is responsible for overseeing the process and ensures that the facilitator has the required skills and experience. But elections at zonal level are crucial for this to happen properly and to avoid a lack of contact between zonal officers and the groups.

*Laffsnet meeting:*
- The requirements for a good facilitator are: education, availability, willingness, mode of transportation (bicycle), chilli farmer him/herself, member of the same group, transparent, accountable. The number of groups defines the number of facilitators.

*Codo meeting:*
- Facilitators (‘information & knowledge officers’) must be practicing chilli farmers, literate and educated, have access to finance, have the ability to train others, be a member of the group, have a means of transport.

Critical issue 2: organizational and technical capacities

*Kiffnet meeting:*
- Many members have been trained by the FAO, but now that they produce for EP more attention must be paid to training on management issues. So besides technical and FFS training also attention to accountancy, transparency, and group dynamics. Much more attention needs to be paid to organizing and stimulating the groups. After several meetings with EP only 5 out of 10 farmers planted chilli. Seed was received 3 months before farmers in Lamu but still volumes with Kiffnet were much lower.
- Many group facilitators did not produce the required letter with names and signatures of participating farmers, nor did it return the collection form at group level. There was no grading nor record keeping at group level, and no organized action towards group bank accounts.
- There is little pro-active support to the program from group leaders – in stead some are using the two types of price levels (small volumes 50 Ks/kg and larger
volumes 60 Ks/kg) to divide farmers after the agreement is signed. Group leaders should instead promote working towards higher volumes in the village and stimulate groups producing the higher volumes. It is not profitable for EP to drive to a collection point for 1 kg. of produce, hence the incentive of a higher price when the volume is larger.

- EP will be strict towards farmers that sell to other buyers and break the contract. It will first send an official letter, indicating it knows that it happened. The group is then supposed to take action and stop the farmer from doing it again. If it happens again EP breaks the contract with the whole group.

*Laffsnet meeting:*
- There is a need for training on nursery establishment. Some start a nursery and end up with 10 plants. It is crucial to plant in time this year. Nurseries should be watered and when rains start transplanting should take place immediately.
- There is a serious need for a full ‘start-to-end’ training since some farmers are in the program longer than others. In fact, those that started were only few, and each group gets many new members.
- Need for a guide on what chemicals to use – now members use different types.
- Train facilitators and organize field days, to demonstrate many aspects in one day and involve groups as well as the Ministry of Agriculture.
- Use field days for a gross margin analysis to show if and how farmers can make money with chilli production
- Use field days to introduce EP and its services: training, contracts, FFS, assistance with access to finance, demonstrate nursery making, transplanting etc.
- Training of facilitators will be done by EPs extension officers.
- Use field days to train facilitators: select few groups, pick (pre-selected) facilitator and have each facilitator provide a training on one topic.

*Codo meeting:*
- Training of the facilitator should focus on technical and leadership issues.
- Training in course of season: on nursery when it is nursery time, on spraying when it is spraying time, etc. Focus on technical issues (nursery, field preparation, transplanting, pesticides, fertilizers, harvest, grading) and on group topics
- Field days will be organized in March-April 2009 – aimed at demonstrating these topical issues, as well as creating awareness. Field days are not to train specific skills but for members to look at the skills at work
- The training program should work on a training learning manual, something that grows over time and which will be part of trainings and used as a manual.

**Critical issue 3: incentives for farmers to switch**

*Kiffnet meeting:*
- From the 100 groups that were trained through the FAO FFS training in 2008, only 40 now actually produce chilli. Often these are very small groups as well. When chilli production started many did not see it as viable. One (former) competitor, Premium Foods, used to ask farmers to grow chilli and then did not buy. Initially farmers thought EPs program would be the same. This practice happens country-wide: a new crop arrives, every farmer wants to grow it, only to find out that there is no market. Farmers are very reluctant to shift because of this.
- They also did not expect to make a decent living from growing chilli. Farmers now see the profit it makes and wait for the next planting season. It takes time for them to become aware and then become part of the production cycle.
- Meanwhile, some new farmers got disappointed when due to the drought termites destroy the crop. In such cases, a quick response support from EP would certainly serve as a big incentive to continue and grow more.

Laffsnet meeting:
- Compared to cotton, the chilli production process is fast, pest and disease control is easy, and wild animals do not like the crop.
- Due to frequent harvesting incomes increase. Since the farmers settled in the area in 1975 they never had as good profits as they have now.
- Farmers with irrigation shifted from tomatoes to chilli because it is easier and faster to grow.
- And because tomatoes did not offer any market assurance, while chilli provides them with a fixed agreement. Monthly payments feel as earning a monthly salary.
- The role of the committee (group level) is to introduce and promote pepper among farmers, organize the collection centre and assist farmers in the collection process, and to negotiate/secure contracts with EP.

Codo meeting:
- Farmers switched to growing pepper because the innovators proved it was profitable. It has proven to be the only cash crop that pays well.

Critical issue 4: competitive position to attract new farmers

Kiffnet meeting:
- EP’s competitor, Premium Foods, provides free seed to farmers and pays cash on a weekly basis for the collected produce, and without a contract. Many smallholders, for example cashew nut producers, are used to work on this basis. They are illiterate and often do not understand the concept of savings.
- Once such benefits become clear to them they will switch to EPs outgrow scheme. EP’s seed is not for free but is of high quality, a contract is signed assuring constant prices, and monthly payments are done through a bank.
- Especially when production is low a contract is preferable because of the certainty it provides: even with small volumes farmers will still be able to sell, whereas without a contract buyers would only buy large volumes.
- EP, through its network of extension officers, provides free and regular training which results in higher yields and thus higher income.
- Overall EP pays between 50-70% more for the produce than its competitors.

Laffsnet meeting:
- EP offers a contract with a fixed price. Varying prices (small volumes 50 Ks/kg and larger volumes 60 Ks/kg) is an incentive to produce more. If a group produces 100 kg/week, or 20 farmers with a feasible 5 kg/week, EP ensures by contract that it will buy. Well-organized groups should at least produce 100-200 kg/week.
- EP wants to avoid that groups are too small; groups should have between 20 and 25 members. Small groups often have committee members that are no farmers –
this reduces ownership. A group with few members is not able to hold elections and thus does not have a committee.

- If farmers change from one network (e.g. Laffsnet) to another (e.g. Codo), for example for reasons of access to finance, is not a problem to EP. To avoid that money is transferred to the old/wrong group an official letter must be sent.

**Codo meeting:**

- EP and Equity Bank have signed an MoU by which both parties screen and by which EP writes a recommendation letter to the bank based on which the bank considers providing a loan without security.

**Critical issue 5: organizing access to finance**

**Kiffnet meeting:**

- Although the local establishment of a branch of Equity Bank has had some delay it is expected to open early 2009. Until then EP pays in cash.
- Many farmer groups filled out the forms and opened accounts with Equity Bank which caused the bank cards (send by bank to EP and to be distributed by EP) to be mixed up. This will be solved before the local branch will start to operate.
- The zonal office should coordinate/stimulate that all groups arrange for an account because EP will soon stop paying cash and transfer money to zonal bank accounts.
- Groups should closely follow payments to ensure its group members get paid accordingly.

**Laffsnet meeting:**

- To obtain loans for hardware from Equity Bank, for example to purchase water pumps for irrigation, will be easier now that groups and their members receive a monthly income in the bank.

**Codo meeting:**

- Access to a financial package is required to invest in detecting fresh water points; in wells, pumps, pipes, and other irrigation related issues; and in fertilizers.

In the course of 2009 a more structured and comprehensive description and analysis of the EP business models and its challenges and critical issues will be made.
3. Action research and technical support to EPs business case

3.1 Changes in organization of service provision

A major change in the EP business model currently being made is the provision of embedded technical services to smallholder producers. Previously EP technical staff were training farmers, organised in Farmers Field Schools (FFS) mainly in technical issues of ABE production. However, due to the dramatic increase in number of farmers engaged in the 3 new production areas a new model for providing technical support to small holders need to be developed. The number of farmer groups are becoming too many to visit and train directly. On average one group consists of 25-30 farmers. EPs extension officers now share around 120 groups among them, and expect another 60-100 groups to join soon.

Therefore EP connected to 3 existing organizations and aims at providing technical assistance making use of the organizational structure of the farmer organizations. Although a more thorough description and analysis of the 3 farmer organizations is required, the mission jointly with EP management identified already a number of critical issues for capacity development of the farmers organizations:

- At farmer level there is a real lack of commercial skills, such as accounting, finance and record keeping. Especially record keeping is crucial: collection by EP takes place at group level, and EP pays for the produce at group level as well. Without good records traceability is not possible, nor are payments from group to individual farmers.
- Committees (district or zonal level) are no strong organizers, selected staff does often not have the required skills. There are no frequent elections being organized.

EP intends to train facilitators at the group level as FFS facilitator and providing technical assistance in ABE to the farmers in the group. Each group will have one facilitator, and this facilitator will be trained through a training of trainer (ToT) program organized by EP and the project team. As some groups have only a few members the emphasis of the ToT will be on strengthening the larger existing groups rather than small and/or new groups. To overcome the issue of group facilitators wishing to receive pay for their services, EP will pay group facilitators a small fee per week, for being present at ToTs and for actively training group members. Later in 2009 EP intends to introduce a new structure in which the facilitator gets paid in the form of a bonus (paid for by EP, in addition to the agreed price per kg.) of 1 Sh/kg of produce that is collected from his/her group.

3.2 Training support by the project

Training activities in 2009 will focus on three levels: training of EP extension officers, training of group facilitators (bi-weekly and monthly) by these freshly trained EP extension officers, and training of farmers by the trained facilitators. The training of EP extension officers focuses on organizing the ToTs, both in terms of
advising on the model (e.g. farmer field schools, field days) and on training on
facilitating skills, and technical and agro-economic knowledge.
The training of facilitators (both monthly and bi-weekly) focuses on organizing field
days and on defining technical training issues, and help analyze what training material
is already available (manuals, material) and how it needs to be adopted. This will
result in the design and production of easy-to-use resource books. These skills,
methods and resource materials will enable group facilitators to organize specific
technical trainings to farmers.

The training components (A-D), including a breakdown of the costs and number of
sessions, can be found in the table below. The project proposes to contribute to EP by
sharing the costs of the overall training program and allocate budget for the
components B and C: training of facilitators (monthly and bi-weekly), at the total cost
of Ks 745,500 and Ks 114,000, or Ks 859,500, or roughly 8,500.- Euro.
Another project contribution to the EP business case will come in the form of hiring a
local (Nairobi-based) consultant with expertise in Farm Field School methodologies
and material. For this the project reserves an additional 6,500.- Euro.

Table 1: Training components to strengthen the EP business case

<table>
<thead>
<tr>
<th>Components</th>
<th>meetings</th>
</tr>
</thead>
<tbody>
<tr>
<td>A) training staff: monthly</td>
<td>6</td>
</tr>
<tr>
<td>B) training facilitators: monthly</td>
<td>6</td>
</tr>
<tr>
<td>C) training facilitators: bi-weekly</td>
<td>12</td>
</tr>
<tr>
<td>D) training farmers: weekly</td>
<td>24</td>
</tr>
</tbody>
</table>

Number of facilitators
Kiffnet 40
Laffsnet 25
Codo 30
**total** 95

**Component A:**
**Training of EP Staff Monthly**
North (Lamu&Tana District)
participants 7
materials per participant 800
number of training sessions 6
fees 0
travel 500
food & refreshments 200
rent location 2500
transport (trainer) 7000

sub-total 120,000

South (Kilifi&Malindi)
participants 7
materials per participant 800
number of training sessions 6
fees 0
Travel 500
food & refreshments 200
<table>
<thead>
<tr>
<th>Component A: Training facilitators</th>
<th>Monthly</th>
<th>LAFFSNET</th>
<th>CODO</th>
<th>Total</th>
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</thead>
<tbody>
<tr>
<td>Participants</td>
<td>40</td>
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<td>food &amp; refreshments</td>
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<td>200</td>
<td>200</td>
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<tr>
<td>rent location</td>
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<tr>
<td>Transport</td>
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</tr>
<tr>
<td>Sub-total</td>
<td>285,000</td>
<td>214,500</td>
<td>246,000</td>
<td>745,500</td>
</tr>
</tbody>
</table>

Component B: Training facilitators

**KIFFNET**

- Participants: 40
- number of training sessions: 6
- materials per participant: 500
- fees: 100
- Travel: 250
- food & refreshments: 200
- rent location: 2500
- Transport: 3000

Sub-total: 285,000

**LAFFSNET**

- Participants: 25
- materials per participant: 500
- number of training sessions: 6
- fees: 100
- Travel: 250
- food & refreshments: 200
- rent location: 2500
- Transport: 7000

Sub-total: 214,500

**CODO**

- Participants: 30
- materials per participant: 500
- number of training sessions: 6
- fees: 100
- Travel: 250
- food & refreshments: 200
- rent location: 2500
- Transport: 7000

Sub-total: 246,000

**Component C:**

Training facilitators: bi-weekly

- participants (facilitators): 95
- materials per participant: 0
- number of training sessions: 12
- fees: 100
- Travel: 0
- food & refreshments: 0

Sub-total: 216,000

**Total:** 745,500
Component D:
Training farmers: weekly
participants (facilitators) 95
materials per participant 0
number of training sessions 24
fees 100
Travel 0
food & refreshments 0
rent location 0
Transport 0

**total 228,000**

Grand total 1,303,500

3.3 Training topics and implementation

The following topics have been selected for the training of group facilitators sessions (ToTs) in Lamu, Kilifi and Malindi:
1. Nursery management
2. Introduction to Equator Products
3. Gross Margin Analysis
4. Field Preparation and Transplanting
5. FFS Introduction
6. Production Introduction
7. FFS Advanced

Training of EP extension officers takes place in March. First ToTs (topics 1-4) by the EP staff to group facilitators and Field Days will take place before the end of March. Also Development District Officers will be invited. The trained group facilitators will train their group members in March and April on each of these topics, and trainings on other topics continue after that. Two training sessions for staff from the Ministry of Agriculture are foreseen, in combination with training for EP staff.

Critical issues concerning the implementation of the training program are: the follow up training sessions by group facilitators to group members, and the monitoring of (impact of) training sessions. These will need extra attention in 2009.

Further support activities in reconfiguring and strengthening the supply chain will be identified later in the year. The impacts of the interventions in the business models will be monitored using an innovative ongoing monitoring and evaluating approach.
4 Comparative analysis business models in East Africa

In this component of the project other existing business models dealing with smallholder-based horticulture processing value chains in East Africa will be identified, analysed and compared to the EP case. The result of this activity will contribute to learning, analysis and dissemination component of the project. To achieve this, linkages will be made to two ongoing projects in East Africa where similar activities are being carried out:
1. BO multilateral project Markets and Value Chains, coordinated by André de Jager
2. BO project “Ethiopia: organizational models to link small-scale farmers with the world market”, coordinated by Hans Nijhoff/Ted Schrader, WI.

The focus is on the critical issues and best cases concerning the engagement of smallholders in competitive processing/export supply chains.

5. Learning, analysis and dissemination

No activities on this component were carried out during the inception mission. The following activities are planned in this component of the project:
- Design and publication of training manuals
- Identification and description of critical success factors of smallholder-based horticulture processing value chains
- Assessment of processing pilot on identified factors with a focus on large-scale role-out and development of new processing products, innovation processes, sustainability and pro-poor impact
- Workshops to evaluate business models and discuss options for roll-out
- Policy briefs, publications, internet discussions
- Contribute to discussions in East Africa and globally on value chain development
## 6. Work plan 2009

The following activities are planned for 2009. Main activities 1-5 are described in terms of the components of the project (or chapters 2-6). The following staff will be involved: André de Jager (AdJ; LEI), Davies Onduru (DO; ETC-EA), Hans Nijhoff (HN, WI) and Ted Schrader (TS; WI).

### Workplan 2009

<table>
<thead>
<tr>
<th>Project Component</th>
<th>Jan/Feb</th>
<th>Mar/Apr</th>
<th>May/Jun</th>
<th>Jul/Aug</th>
<th>Sept/Oct</th>
<th>Nov/Dec</th>
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<tbody>
<tr>
<td><strong>1 Inception</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>- Describe EP case and detailed workplan</td>
<td>HN AdJ</td>
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<td><strong>2 EP business model, analysis of critical issues</strong></td>
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<tr>
<td>- Further describe specific organizational elements: EP case and EP critical issues</td>
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<tr>
<td>- Describe specific business model/info elements: EP case and EP critical issues</td>
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<tr>
<td>- Describe specific impact monitoring elements: EP case and EP critical issues</td>
<td>HN AdJ</td>
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<tr>
<td>- Describe specific business/cultural/psychol issues of (not)joining outgrow (link KB/PPO)</td>
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<tr>
<td>- Analyzing data, desk research, link to other projects, towards conc &amp; recomm., reporting</td>
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<td>HN AdJ</td>
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<td><strong>3 Action research and technical support to EPs business case</strong></td>
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<tr>
<td>- Training of Trainers Programme on FFS</td>
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<td>- Optimizing organizational chain needs: EP supply chain</td>
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<td>- Optimizing business model/info needs: EP supply chain</td>
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<td>- Identify impact monitoring needs: design EP supply chain methodology</td>
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The allocated 2009 budget for achieving the work plan is as follows:

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<th>Activity</th>
<th>Partner</th>
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<th>WI</th>
<th>ETC</th>
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<td>Comparative analysis business models</td>
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<td></td>
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<tr>
<td>Learning, analysis and dissemination</td>
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