

EVALUATION REPORT

Establishing a system of integrated resource utilisation under PDL/HIMO in the Districts of Muhanga, Ruhango, Nyanza and Huye

Southern Province, Rwanda



Birgit Kundermann

on behalf of Welthungerhilfe

PN: RWA 1024-04 and RWA 1031-07



Co-Funding by:



**Koninkrijk
der Nederlanden**



**Canadian International
Development Agency**

I. Summary

1 Brief description of the project and framework conditions

The development of marshlands in the Southern Province by the Welthungerhilfe of Rwanda started in 2000 through different projects. They receive substantial funding from the Royal Netherlands Embassy and the Canadian International Development Agency under ESIRU I (November 2004 - September 2007) and subsequent ESIRU II planned until September 2011. Both ESIRU projects are implemented under the national public works programme PDL-HIMO. Their objectives are to establish systems of integrated resource utilisation in four marshlands. The main interventions include the establishment of irrigation infrastructure in the marshlands, the protection of adjacent hillsides, and herewith the marshlands against erosion, as well as a road network facilitating marketing of the production. The use of the established infrastructure is strengthened through the development of agricultural production systems and the organisation of users of the marshlands and terraces with special consideration of gender issues. The target groups include 25.800 households in four districts of the Southern Province.

Although considerable economic growth has been registered in Rwanda since 2000, the Southern Province shows slightly increasing poverty rates with a growing number of vulnerable households and very fragile household food security conditions. Land scarcity, decreasing soil and labour productivity and undamped population growth are the main reasons for this situation. Increasing climatic stress through the irregularity of rains puts constraints on agricultural production and increases vulnerability. Pronounced drought conditions in 2005 / 2006 stroke the rural areas in the entire country. Since 2000, the socio-political development in Rwanda is characterised by the declaration of the end of the emergency period in 2000, and by a decentralisation process which was concluded through a territorial reform as well as by the election of local governments in 2006. Furthermore, substantial progress has been made with regard to gender equality and the protection of the environment through the formulation and implementation of diverse policies. Currently, the local courts are about to conclude the *gacaca* process in order to judge perpetrators of genocide crimes and reconcile them with remaining victims of the genocide of 1994.

2 Outcomes and impacts

The main economic outcomes of the projects by now are rural incomes through the *cash & food for work* schemes of about 3,4 millions of working days for all established infrastructures and the cultivation of 517 ha of marshlands mainly with rice. The incomes of temporary employment and rice marketing were used to cover basic needs in nutrition and clothing (consumption), investment on housing and assets (living conditions), investments in livestock and small businesses (productive investments), and secondary education as well as savings at the local microfinance institutions (future capital). The extent to which these incomes initiated a persisting economic development largely differs between the marshland areas. It depends mainly on the volume of investments, the functioning of the irrigation systems with regard to rice production, and a series of local factors such as remoteness, availability of labourers, and the functioning of local organisations to manage the marshlands. The distribution of benefits among the local population proves to be balanced, since the access to work and marshland plots were not limited. Most of the benefits were created among the population in the immediate surroundings of the marshlands. In those areas, where rice production functions, considerable secondary employment opportunities for rice cultivation are assumed to generate trickle down effects to a wider geographic area which might benefit in particular to land-scarce households with sufficient labour force. According to the beneficiaries, agricul-

tural incomes showed a high fluctuation between 2000 and 2008 in consequence of the climatic conditions, while non-agricultural incomes were largely increased through temporary employment offered by ESIRU. A positive trend has been registered for food security as a result of both, agricultural and non-agricultural incomes as well as improved cultivation techniques. Improved food security includes the quantity and quality of nutrition. Up to now, economic impacts of terracing in terms of increased agricultural production have not been registered. A considerably positive influence is evident, concerning the reduction of rural poverty and income disparities for the direct areas around the marshlands as well as a reduction of rural out-migration.

Women could be integrated successfully in all activities, and gained considerable income, which is improving their self-confidence and favouring their weight in the use of income, although decision-making at household level is still mainly dominated by men. In the context of the application of the national gender policy, their representation in local organisations and public life has been strengthened. Although impacts on participation in development have not been registered, the overwhelming economic benefits and the generally positive socio-political evolution have encouraged people to develop perspectives and motivation for the future on an individual level. In contrast, the evolution of local organisations, including the marshland organisations, shows important deficiencies with regard to participation in decision-making, transparency of procedures and financial management in reality. The current process of establishing cooperatives in a supporting environment gives hope to improve the functioning of local organisations. Since social cohesion at the local level has suffered from the gacaca procedures and is fairly low by now, the finalisation of this procedure might provide better conditions for organisational development in the future. The high level of land scarcity, putting pressure on mainly intra-familial land conflicts, is assumed to be alleviated by the development of highly productive plots in the marshlands and might also be reduced in the future by some recently started activities on conflict resolution and cadastral mapping.

With regard to environment, substantial improvements in the direct catchment area of the marshlands have been achieved through hillside erosion control. The terraces prove to be very solid. Erosion is successfully stopped here and the combination with infiltration galleries on the upper hillsides contributes largely to the protection of the marshlands. Increased infiltration on the hillsides improves agricultural production here and protects it against irregularity of rainfall to a certain extent. Efficient water control in the marshlands largely reduces the risk of flooding in the marshlands as well as for the downstream users. Therefore, a contribution to mitigating the effects of climatic change is evident. The Government's efforts in fighting erosion combined with the project's achievements increase the local capacities to manage the environment sustainably.

On the basis of ESIRU's economic impacts, some indirect contributions to other development objectives such as health in terms of nutrition, as well as education are assumed. The adherence to health insurance systems has increased through ESIRU. Herewith, the projects contribute to all livelihood sectors, since the economic, natural, financial, human and social capital are improved. ESIRU contributes also largely to the objectives of the Welthungerhilfe in terms of reducing poverty and hunger and helping people help themselves. In addition, an indirect impact to the development of national policies is assumed as a result of a high number of high ranking and repeated visits from different Ministries and other national institutions.

3 Sustainability

The sustainability of ESIRU's achievements depends largely on the capacities of the local organisations and institutions to manage the established infrastructure. The economic sustainability of rice production is obvious and allows paying inputs and hire labour force. For one marshland, which cannot produce rice due to a lack of water availability, the sustainabil-

ity depends on the development of an appropriate utilisation concept. The quality of water management and of maintenance of the infrastructures represent the major constraints for the sustainability of production. Functioning of post harvest and agro-processing facilities and marketing are other sustainability factors. For terraces, sustainability is related to the development of profitable production systems and the functioning of agribusiness as well as the availability of manure to improve soil fertility. Concerning roads, their sustainability will depend on the capacities of the local governments to care for their maintenance and allocation of respective budgets by the Government. The capacity of local governments and their technicians to follow-up activities and assist the users in case of problems is another main factor of sustainability.

Furthermore, the user's ownership of the infrastructure as well as the realisation and fulfilment of responsibilities of local governments regarding major maintenance works, are other important factors of sustainability. In addition to general maintenance they also include the management of access / registration of the marshland plots through local governments. Gender achievements are regarded as quite sustainable in the context of expected continuation of the positive overall evolution, but could be improved through specific interventions as foreseen. Environmental sustainability is generally assumed as long as the efforts of the Government continue and capacities of local organisations and institutions will be further developed. The functioning and management capacities of local organisations are perceived as the major bottlenecks towards sustainability. Their connection to and integration into other national networks in terms of production and marketing are other vital elements of sustainability.

4 Relevance

The relevance of the project is very high with regard to the core problems of the target group, the objectives of the partner country, as well as the objectives of Welthungerhilfe. ESIRU addresses the main problems of the target groups of poverty and food insecurity, caused by land scarcity and a lack of land and labour productivity, as well as the effects of climatic irregularities with the exception of population growth.

National objectives and policies are largely enhanced through ESIRU, especially with regard to raising agricultural productivity including irrigated agriculture, the management of the environment in terms of soil erosion and soil productivity, the building of economic infrastructure (roads) and the improvement of water resources management. Other national policies in the sectors of agriculture (zero-grazing, sustainable production systems, use of fertilisers, commodity chains...) are strengthened and the decentralisation process is promoted to the extent that institutional integration with ESIRU will succeed. A specific relevance of ESIRU consists of its embedment into the national public works programme (PDL-HIMO). The high relevance of ESIRU is demonstrated by a huge number of high ranking visitors to the project.

The project is also very relevant to the objectives of Welthungerhilfe. It is fully in line with the objectives of the regional concept of Welthungerhilfe for the Great Lakes Region and the main aspects of Welthungerhilfe's sectoral concepts.

5 Effectiveness

The planning of the project is well elaborated and relies on the experiences of the preceding projects. Its working concept is oriented rather towards the requirements of the natural conditions and resources than on the socio-organisational conditions of the population. The log-frame follows a coherent logic from the results to the specific and overall objective. Its objec-

tive is realistic on the basis of a prolonged duration of ESIRU II as planned in order to care sufficiently for the use of infrastructure and organisational development. The planning of financial, material and human resources is adequate with the exception of a lack of local extension staff and financial resources to promote the sustainable and profitable use of the established infrastructure. The focus on rice production does not cover all requirements.

There are several positions vacant in the project, which involve a delay in the evolution of organisational development and use of infrastructures, also in regard to gender, impact monitoring and efficient management of the field office. Project staff is highly overcharged at the coordination office and at the field office. For various reasons the planned institutional set-up of the project could not yet be determined and put into practice, occasioning insufficient integration of local governments into project execution and steering. An efficient capacity building and training concept has not been elaborated.

All works concerning the establishment of infrastructure are progressing well and are of good quality. In total, 517 ha of marshland have been established since 2000, and 335 ha of terraces and 999 km of infiltration galleries were constructed through ESIRU I. The road network has been improved on 73 km in the marshlands. In total, 3.425.303 person days of labour were used since 2000 through food & cash for work and a maximum of human labour was used for all works.

The marshland works are of good quality, including preparation and execution. Some problems of water availability could be resolved or are about to be resolved in the near future for two marshlands, while the water management problems in one marshland area currently remains unresolved. The maintenance of irrigation infrastructure and water management by the local organisations is of mediocre quality. Cadastral maps established by ESIRU allow the local governments an efficient registration of beneficiaries. The terraces are well established and proved to be solid. Some parts of the terraces show fertility problems and the planting of fodder crops and agro-forestry trees is not completed yet. Road rehabilitation is performing well.

The use of established infrastructures and the organisational development of user groups are lagging behind and strategies are not yet sufficiently developed. The current use of many terraces is rather inadequate for various reasons, including adverse national sub-policies regarding cassava multiplication and production. However, appropriate rice varieties for the marshlands are about to be selected for further multiplication, and trials on diverse crops suitable for the production on terraces are ongoing and include also promising species for agro-processing as well as research on fodder crops. Post-harvest treatment and processing have not yet started and are about to be reinforced by the gender component in the near future. Organisational development of user groups involves a series of trainings, but which lack an appropriate follow-up. Networks of user groups and their connection to national institutional frameworks are planned.

With regard to the technical execution, most indicators exceed the targets in terms of temporary employment, established infrastructure and the number of planned users. Targets in terms of capacity building have not been reached. The status of achievement of the project's objectives according to the indicators reflect the same situation in the sense that most of the physical targets have created economic benefits such as increased agricultural and non-agricultural income and household assets. However, agricultural income is subject of climatic conditions and rice production has not attained the targets regarding yields, number of rice seasons and the quantity of marketed rice. Some indicators could not be verified quantitatively, such as the level of malnutrition. A high integration of women in *cash for work* activities (> 60 %) and rice cultivation (50 % of plots assigned to women) could be realised. The maintenance of the infrastructure does not prove to be efficient yet.

The communication between the project and the target groups performs well, although their involvement into the project cycle is not yet realised for planning and monitoring. With regard to the integration of local governments, progress has been made through the participation of many representatives in operational planning workshops, while the official assigning of responsibilities is planned to be realised in the near future. The quality of cooperation in the field, where local authorities care for the recruitment of labourers and the communication with target groups is performing quite well in some areas, but is also impeded through a high work load of the officers at all levels.

6 Efficiency

The repartition of costs of the project corresponds to the norms for a project which is centred on rehabilitation during the construction process, but highly development-oriented with regard to its outputs. An important part of the budget is directly transferred to the target groups as salaries (35 %), partly as *cash for work*, partly as other salary for construction works.

The cost-benefit ratio for marshland works differs according to the technical challenges of the different marshland sites. They are estimated as being well within the norms for the three old marshland sites, while a new marshland site approaches the upper limit of investment costs. Rice production proves to be economically valid and the net benefits would allow paying back the investment. For terraces, economic viability is expected at medium and long term. The investments for roads are justified when combining marketing with other benefits of communication and transport and their general necessity for other development sectors.

The quality of the monitoring system is good for progress monitoring, while a coherent impact monitoring system has not yet been developed. The yearly socio-economic surveys carried out for this purpose include a high number of data on socio-economic conditions, but show deficiencies regarding the set-up, the comparability of data, and their immediate usefulness for project steering. MDG-monitoring in a complementary MDG-project is also carried out in one marshland site, but proves to be less useful for ESIRU project steering as well.

7 Annual cross-cutting theme

Helping people help themselves as Welthungerhilfe's annual cross-cutting theme is understood as initiative to create or shape own livelihood, while supporting self-help as an approach is based on the empowerment of disadvantaged groups. Many of the principles of this approach are being considered by ESIRU, especially the building up on existing marshland groups, subsidiarity of interventions, the use of infrastructures under responsibility of target groups, and the plans to connect target groups with relevant networks. However, the contribution of the target groups remains limited, and a coherent concept for capacity building has not been worked out. Among the instruments of self-help, the involvement of decentralised structures and the planned project steering committee are favourable elements, while the integration of target groups into all stages of the project cycle is not yet realised. ESIRU has improved the conditions for self-help through its huge economic impact, the availability of more productive resources and the improvement of skills and general motivation to invest in the future.

8 Most important recommendations

There are five main recommendations to the project, referring to the empowerment of the use of project outputs and gender (software components) (1), to its institutional integration (2), the field office structure (3), the implication of target groups (4) and the creation of an impact monitoring system (5). These recommendations are of immediate priority concern.

(1) The empowerment of the software component requires the filling of vacant staff positions and of extension staff at field level, the elaboration of operational strategies for the use of infrastructures and capacity building and a detailed referring budget, the elaboration of full agricultural production and commodity chains and the creation of farmer organisations / co-operatives on the hillsides.

(2) The institutional integration of local governments into ESIRU should include a steering committee and an execution body. The steering committee should include representatives from districts and target groups while the execution body should mainly refer to the sectors. The execution body should have full support from MINALOC and MINAGRI in order to fulfil their tasks.

(3) A new field office planned in Nyanza should host all technical departments and administration from the beginning on, while (impact) monitoring should first focus on the old marshlands. The current field office at Muhanga should be transformed into a cooperatives coordination & representation office from 2010 onwards.

(4) Target groups should be fully integrated into all stages of the project cycle – planning, implementation and monitoring in order to ensure their informed and active participation. Study tours to other marshland sites before implementation and the participatory elaboration of land use plans on the basis of technical requirements are of particular concern.

(5) An impact monitoring system should be developed, including quantitative elements at the outcome level and participatory assessment elements at the impact level. A monitoring of the quality of cooperation between the various cooperating institutions should also be foreseen. Finally, it should be efficiently integrated into project steering, project management and into the project cycle.

9 General conclusions

The project gives a good example to combine rehabilitation works with long-term development issues since it provides important economic short-term benefits with sustainable long-term benefits for populations experiencing a high level of food insecurity. –

The contribution of Welthungerhilfe's MDG project to ESIRU in one of the marshland areas remains questionable, since available financial resources scarcely allowed filling the gaps in ESIRU's overall strategy as planned. In contrast, the high level of monitoring activities of this MDG-project consumed considerable resources, but only shows a rather limited usefulness for ESIRU. Other additional projects concerning drinking water and school buildings with diverse additional donors complete the interventions in the same area well, but involve a comparatively high additional work load in terms of acquisition, management, accountability and communication.

Family planning should be considered by Welthungerhilfe as a cross-cutting issue in countries with high population and resource pressure.