



INTERIM PROGRESS REPORT

Reporting UN Organization	: United Nations Development Programme
Country	: Lebanon
Project No.	: 00059666 and 00069789
Project Title	: Flood Risk Management and Water Harvesting for Livelihood Recovery in Baalback-Hermel, phase I and II
RF Signature date	: 10 October 2007
Project Start date	: Phase I: 01 February 2008 Phase II: 20 February 2009
Project Timeframe	: Phase I: Two years Phase II: Three years
Reporting Period	: January to March 2010

I. PURPOSE

Project Summary & Objectives

The project aims at assisting the Government of Lebanon in its recovery and reform efforts in the conflict-affected and high-poverty region of Baalback-Hermel through better land management practices, namely flood risk reduction and improved access to irrigation water and networks to achieve crop diversification and improve productivity.. This will be achieved through the construction of stone walls, check dams and water collection reservoirs to prevent runoff water from reaching villages and farms and through the restoration of land cover to reduce soil erosion. The objectives related to water management will be achieved through construction of membrane-lined reservoirs to collect unused water from springs, rainfall and snow melts and through installation of water-use efficient irrigation networks and systems that will be used by local farmers to improve their crop diversity and productivity. The project is financed by the Government of Spain through the Lebanon Recovery Fund established on the occasion of the Stockholm Conference, and is in line with the UNDP's development goal of alleviating poverty in rural drylands of the conflict-affected Baalback Hermel area.

Project Phases and Expected Outputs

FRM I 2.8 million USD	<ul style="list-style-type: none"> ➔ Establishment and Implementation of a flood risk management plan over an area of 94 km² in Aarsal and Fakhe region. ➔ Water harvesting in North Bekaa and installation of efficient irrigation networks. ➔ Crop diversification and improved land cover in North Bekaa. ➔ Improved public awareness on flood risks management and training of the target municipality on maintenance of flood management structures.
FRM II 3.8 million USD	<ul style="list-style-type: none"> ➔ Establishment and Implementation of a flood risk management plan over an area of 200 km² in Upper Aarsal and Ras Baalback ➔ Improved land cover in Ras Baalback and upper Aarsal mountains. ➔ Improved soil conservation in Ras Baalback and Aarsal. ➔ Improved public awareness on flood risks management and training of the target municipality on maintenance of flood management structures.

Project Linkages to National Priorities and Recovery

The National Action Program to Combat Desertification (NAP), which was developed in 2003 by the Ministry of Agriculture and in collaboration with UNDP and GTZ, classified the project's target area (Baalback-Hermel) as one of the areas prone to high risks of desertification. This is mainly due to lack of proper land and water management practices, bad rainfall distribution, overgrazing, steep mountains with shallow soil and poor vegetative cover. Moreover, summer droughts and uneven rain distribution are the main reasons for poor agricultural productivity in that area.

The effect of the July 2006 conflict on North Bekaa, particularly Baalback-Hermel area was not to be underestimated. Large scale destructions in infrastructure, biodiversity and agriculture were reported. These led to harder living conditions, more poverty and increased soil erosion threats.

The expected outcomes from the current project particularly those related to water harvesting, increased vegetation cover and higher productivity will serve very well the national efforts and plans aiming at combating desertification and alleviating poverty in North Bekaa. They will also serve the recovery efforts made by the Lebanese government in normalizing the living conditions of rural communities and in restoring the basic needs and infrastructure for practicing sound and profitable agriculture in the affected area.

Project Implementation Partners

International Partners: Spanish Agency for International Cooperation
German Agency for Technical Cooperation (GTZ)
Arab Center for the Studies of Arid Zones and Dry Lands (ACSAD)

National Partners: Ministry of Agriculture
Ministry of Water & Energy, Bekaa
Local municipalities and communities

II. RESOURCES		
	Phase I	Phase II
Total budget approved	USD 2,834,880.00	USD 3,800,000.00
Disbursements as for January- March 2010	USD 181,146	USD 57,672
Commitments for next quarter	USD 250,000	USD 100,000
Available Balance:	USD 877,085	USD 3,668,997

Budget and Expenditure Breakdown per LRF Category:

CATEGORY	Phase I		Phase II	
	Total Budget (USD)	Exp. January-March 2010	Total Budget (USD)	Total Exp. to date (USD)
1. Personnel (Incl. staff and consultants)	200,000	2,450	300,000	50,729.00
2. Contracts (Incl. companies, professional services)	250,000	8730	250,000	1375.00
3. Training (incl. AV printing / production)	50,000		50,000	
4. Transport (local)	20,000		30,000	886.93
5. Supplies and commodities (Incl. IT equipment and rental & maintenance)	50,000		40,000	825.00
6. Equipment (including installation)	2,000,000	157,300	2,800,000	
7. Travel	50,000		40,000	
8. Miscellaneous	37,833	815.5	24,000	82.5
9. Agency Management Support (7%)	186,048	11,850	266,000	3773
TOTAL	2,834,880.00	181,146	3,800,000	57,672

III. Results: Progress per activities

Project Outputs	Activities	Progress to date	Targets for 2010	Status for 2009
1. Project Management and Coordination	1.1 Technical, financial and operational Management. 1.2 Promote synergies with relevant on-going projects in target area. 1.3 Exchange of information and coordination meetings	<ul style="list-style-type: none"> Ongoing meetings with the project stakeholders Project board review meeting in the presence of the Minister of Agriculture and relevant stakeholders was undertaken on March 1st, 2010 Monitoring of project progress and the work of consultants and contractors is ongoing Coordination meetings held with different ministries, the UNDP disaster risk management program, and academia 	<ul style="list-style-type: none"> Strengthened coordination with project stakeholders 	<ul style="list-style-type: none"> On-going
			<ul style="list-style-type: none"> Coordination with Municipality of Aarsal and Ras Baalback for phase II implementation 	<ul style="list-style-type: none"> On-going
			<ul style="list-style-type: none"> Design of flood risk management structures for Phase II 	<ul style="list-style-type: none"> In progress
			<ul style="list-style-type: none"> Procurement of sub-contractors for the implementation of Phase II 	<ul style="list-style-type: none"> Awaiting finalization of design
			<ul style="list-style-type: none"> Submission of quarterly progress reports 	<ul style="list-style-type: none"> submitted
2. Flood Risk Management and Reduction	2.1 Data collection and identification of target area. 2.2 Modeling of target area and generation of maps. 2.3 Constructions for flood control and prevention. 2.4 Monitoring, evaluation and impacts assessment	<ul style="list-style-type: none"> The consultant doing the design of flood risk and erosion control structures has undertaken two field missions and developed a list of structures for almost a third of the watershed area. ELARD has submitted the watershed assessment report by the end of February 2010 and it has been reviewed and commented on by the PM unit of the flood project Constant monitoring of flood events being undertaken by the project unit 	<ul style="list-style-type: none"> Design of flood risk management structures (Phase II) 	<ul style="list-style-type: none"> Watershed assessment report submitted
			<ul style="list-style-type: none"> Initiation of excavations of flood water collection reservoirs (Phase II) Initiation of construction of FRM structures (Phase II) 	<ul style="list-style-type: none"> Awaiting completion of the design and procurement
			<ul style="list-style-type: none"> Development of a flood mgt plan for Ras Baalback (phase II) 	<ul style="list-style-type: none"> Delivery in May 2010 Team of Experts identified and work in progress
			<ul style="list-style-type: none"> Determine the number and locations of stone walls for phase II. 	<ul style="list-style-type: none"> Planned for Quarter 3, 2010 Expert has undertaken 2 missions
3. Water Harvesting and Irrigation Networks	3.1 Field surveys and assessment of water resources 3.2 Identification of water-harvesting sites.	<ul style="list-style-type: none"> Work in progress for the Deir El Ahmar Pond Changes in the design requested by the Deir El Ahmar COOP and municipality Re-design of the irrigation network to better suit local needs 	<ul style="list-style-type: none"> Establishment of an artificial irrigation lake in Deir Al-Ahmar (Phase I) 	<ul style="list-style-type: none"> Work in progress

	<p>3.3 Constructions of reservoirs and irrigation networks</p> <p>3.4 Selection of beneficiaries and technical advice</p>	<ul style="list-style-type: none"> • Delays due to need to secure rights of crossing through private lands • Identification 	<ul style="list-style-type: none"> • Installation of irrigation networks for target beneficiaries (Phase I) • Rehabilitation and completion of reservoir initiated by the Army in Barka (Phase I) 	<ul style="list-style-type: none"> • Contractor appointed • Design of reservoir specifications on-going and procurement of contractor in process
<p>4. Land Cover Increase and Soil Erosion Reduction</p>	<p>4.1 Identification of erosion-sensitive areas</p> <p>4.2 Establishment of nurseries for seedling production</p> <p>4.3 Crop diversification and increased productivity</p> <p>4.4 Forestation and forage cultivation</p>	<ul style="list-style-type: none"> • Identification of suitable land areas for reforestation in Aarsal • Planting of seedlings in progress in Aarsal • Initiation of green cover works in Ras Baalback to identify potential land areas for planting • Meetings with the herdsmen in Aarsal to identify possible cooperation 	<ul style="list-style-type: none"> • Forestation in Ras Baalback with wild fruit trees (Phase II) 	<ul style="list-style-type: none"> • Identification of land areas for planting
			<ul style="list-style-type: none"> • Development of plan to increase green cover in Ras Baalback (Phase II) 	<ul style="list-style-type: none"> • Identification of land areas for planting
			<ul style="list-style-type: none"> • Completion of reforestation in Aarsal (Phase I) 	<ul style="list-style-type: none"> • Planting of remaining seedlings in Aarsal by ARDA
<p>5. Sustainability, capacity building and awareness raising</p>	<p>5.1 Empowerment of target beneficiaries.</p> <p>5.2 Awareness raising on flood and water management.</p> <p>5.3 Capacity building through training.</p> <p>5.4 Alternative livelihoods</p>	<ul style="list-style-type: none"> • Training on FRM structure maintenance was done by ACSAD for stakeholders in Aarsal. • An event was organized in Aarsal in order to donate a excavator for the Municipality of Aarsal to undertake maintenance works for the FRM structures. The event was attended by the Minister of Agriculture, the Resident Representative of UNDP and the Ambassador of Spain in Lebanon. The event was covered by the Lebanese Press (TV, Radio and Newspapers). The event included a field visit to the reservoirs and walls. • A Sustainable Land Management Communication Strategy including flood was developed by the Marketing expert of the project and the PMU. • A training on hydrology and watershed modeling was done for SLM and MoA staff 	<ul style="list-style-type: none"> • Building the capacity of Municipality of Aarsal for future maintenance of established flood structures. 	<ul style="list-style-type: none"> • Excavator received by the municipality

Implementation Constraints

- Securing rights of passage for piping delayed the water harvesting pond construction in Deir El Ahmar
- Identification of land suitable for reforestation in Aarsal delayed the process of improving the green cover

Key Partnerships & Collaboration

The project initiated discussions and a possible collaboration with the Disaster Risk Management Program of UNDP which will work on disaster risk management at the institutional level.

IV. Work plan per activity for the second quarter in 2010 (April-June 2010).

Key Milestones Wks	April				May				June			
	1	2	3	4	1	2	3	4	1	2	3	4
1. Project Management and Coordination												
1.1 Technical, Financial and operational mgt.												
1.2 Promotion of synergies with other projects												
1.3 Information exchange and coordination.												
2. Flood Risks Management and Reduction												
2.1 Data collection and identification of target area.												
2.2 Modelling of target area & generation of maps.												
2.3 Constructions for flood control and prevention.												
2.4 Monitoring, evaluation & impact assessment.												
3. Irrigation Water Harvesting and Networking												
3.1 Construction of water harvesting pond in Deir el Ahmar												
4. Land Cover Increase & Soil Erosion Reduction												
4.1 Forestation and forage cultivation												
4.2 Identification of planting areas in Ras Baalback												
5. Sustainability, Capacity Building & Awareness Raising												
5.1 Empowerment of target beneficiaries.												
5.2 Awareness raising on flood and water mgt.												
5.3 Capacity building through training.												
5.4 Alternative livelihoods												

Annex I Pictures and Maps (Phase I)



Training on Hydrology and Watershed Modelling



Field visit to the Flood I reservoirs



Excavation in Deir El Ahmar



The Minister of Agriculture visiting on of the walls



The handing over opening speeches



The Minister at the reservoirs

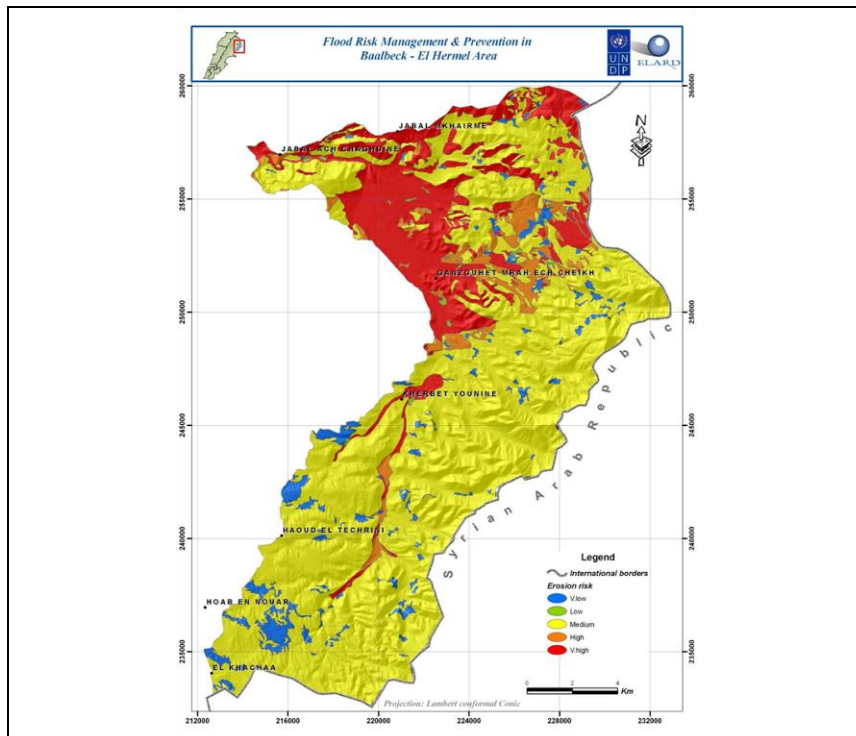


Handing over of the excavator



Site for the new pond in Barka

Annex I Pictures and Maps (Phase II)



Soil Erosion Risk Map Phase II



Field inspections for FRM structures (Phase II)



Field inspections for FRM structures (Phase II)