



ANNUAL REPORT 2011 PROJECT: CAPACITY BUILDING IN ASSESSING AND MANAGING WATER RESOURCES OF VIETNAM (VIE 0703411)

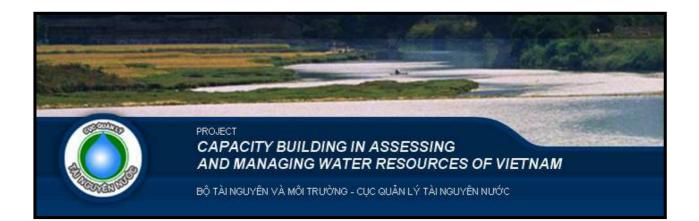


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Acronyms

ADB	Asian Development Bank						
BGR	Bundesanstalt fuer Geowissenschaften und Rohstoffe						
BTC	Belgian Technical Cooperation						
CPMU	Central Project Management Unit						
CTA Chief Technical Advisor							
СТО	Communications and Training Officer						
CWRPI	Centre for Water Resources Planning and Investigation						
DB	Database						
DoNRE	Department of Natural Resources and Environment						
DWRM	Department of Water Resources Management						
IWRM	Integrated Water Resources Management						
M&E	Monitoring and Evaluation						
MET	Monitoring and Evaluation Tool						
MoNRE	Ministry of Natural Resources and Environment						
NE	National Water Resources Expert						
NEX	National Execution						
PMU	Project Management Unit						
PPC	Provincial People Committee						
PPMU	Provincial Project Management Unit						
PSC	Project Steering Committee						
PSU	Project Support Unit						
TFF	Technical Financial File						
WR	Water Resources						
WRIS	Water Resources Information System						
WRM	Water Resources Management						

1 Project form

Project name	Strengthening the capacity within Vietnam for the assessment and management of water resources as a basis for rural water supply for poverty reduction ¹
Project Code	VIE 0703411
Location	Department of Water Resource Management (DWRM), 68 Bui Thi Xuan, Hanoi, Vietnam
Budget	Belgian Contribution: Regie budget: 893.600 € + National Execution budget: 3.106.400 € = 4.000.000 Euro National Contribution: 400.000 Euro;
Key persons	Dr. Nguyen Thai Lai (Chairman, Steering Committee); Mr. Le Huu Thuan (Director), Mr. Phi Quoc Hao (Coordinator), Mrs. Vu Thi Lan (Chief Accountant), Mr. M. Junker (CTA), Mr. Ly Minh Dang (NE), Mrs. Tran Minh Phuong (CTO), Ms. Cap Thi Van Anh (BTC PO), Mr Pierre Dulieu (BTC VN Res Rep)
Partner Institution	Ministries of Natural Recourses and Environment (MoNRE)
Date of implementation Agreement	20/12/2007 (Signature of the Implementation Agreement), Start date of Project: 11/11/2008
Duration (months)	48
Target groups	MoNRE Agencies and DoNRE's in 7 pilot provinces
Global Objective	To strengthen institutional arrangements and build capacity within MoNRE and its provincial and district bureaus in order to support the strategic investigation and management of regional water resources for efficient development so as to reach the Vietnamese Development Goals.
Specific Objectives	 The strategic water resource planning is improved. The protection of water resources is improved. Public awareness about the protection of water resources is improved. MoNRE/DoNRE's staff capacity in water resources management is increased.
Results	Result 1: A comprehensive ground and surface water resource assessment carried out in 7 provinces Result 2: An interactive database operational at MoNRE and 7
	DoNRE's Result 3: The IWRM concept, including decision-making protocol, developed and pilot tested in selected provinces Result 4: A water resource development and protection plan developed in 7 provinces Result 5: Water Resource Monitoring Network in 7 provinces is enhanced (= CEMDI's water resource and environmental monitoring system applied in 7 provinces) ² Result 6: Public awareness campaigns implemented in each of the 7 provinces Result 7: A series of staff training courses implemented in key WRM areas

 ¹ This is not the actual project title and should be updated in FIT / PIT using title given in the SA/TFF: "Capacity Building in Assessing and Managing Water Resources of Vietnam"
 ² This title should be updated because CEMDI doesn't exist anymore and the network will be under

the management of the DoNRE's.

2 Summary

In the past two decades Vietnam has experienced a rapid population growth, socio-economic development, urbanization and industrialization that lead to vastly increasing demand on natural resources in many sectors. The industrialization of Vietnam is going through a fast increase of the demand on water resources in all sub-sectors, like irrigation, water supply, industrial and agriculture production, but also in transport and recreation, etc.

This vastly increasing demand has in the first place an impact on the surface water resources, such as rivers, lakes, streams, which have been polluted by discharging industrial, agricultural, aqua-cultural and domestic waste to the water bodies without treatment. Secondly affect in long term also the ground water resources by excessive exploitation or inadequate protection of aquifers due to the millions of poorly constructed and maintained tube wells of the last few decades.

The result is an increasing competition for water resources between all stakeholders and the conflicts of interest related to that.

In the mean time, Vietnam has been concluded as being one among five countries in the world that will be most affected by climate change and sea level rise in which water resources is identified to be the sector that will suffer the worst impacts. In such a context, the lack of adequate capacity and instruments at all levels has made the management of the country's waters more challenging than ever before.

To address the water challenges, in recent years, the Vietnam Government / MoNRE - with support from the donors community - has been implementing a number of initiatives to strengthen the legal frameworks of which the most important are: (i) revision of current Water Law (under finalization); and development of (ii) National Water Resources Strategy; (iii) National Target Programme on Water Resources (under finalization); and, (iv) and National Target Programme on Climate Change.

For this reason the present project main targets are focused on the enhancement of an effectively management of the water resources, on the empowerment of national legal framework (mentioned above), following IWRM strategies, and on strengthening of the capacity on central and local level and to rise up public awareness about the value of water and the necessarily of and sustainable management and protection of all water resources.

2.1 Analysis of the intervention

Intervention logic	Efficiency	Effectiveness	Sustainability
Specific objectives:			
Result 1: Comprehensive ground- and surface water assessment carried out in 7 provinces	В	С	Х
Result 2: : An interactive water resource database operational in MoNRE and 7 DoNRE's	В	В	D

U	U	Х
В	В	В
С	С	С
В	В	В
С	С	Х
	C	C C

Very good performance

B: Good performance C:

Performing with problems, measures should be taken

Not performing/ having major difficulties: measures are necessary

Budget	Expenditure year 2011 (NEX and Regie)	Total expenditure year until (31/12/2011, NEX and Regie)	Balance of the budget	Execution rate
4.000.000	1.545.730	3.094.518	905.482	77%

2.2 Key elements

D:

One of the main efforts in 2011 was to proceed with the data collection and assessment of the water resources information at provincial and central level and to finalize the Water Resources DB/ Information System, which is closely linked to this activity.

Further more the project put emphasis on finalizing technical Guidelines for WRM, especially to mention are the Guideline on Monitoring and Assessing Water Resources and the Guideline on Protection for Groundwater.

Another key element in 2011 with crucial importance for the implementation was the preparation of 7 Water Resources Monitoring plans which are comprehensive planning tools for the water resources observation network with a vision until 2012.

Based on these Monitoring Plans all 7 provinces executed the installation of Groundwater Monitoring Station, which were equipped with data-logger at the end of 2011, to record change in the groundwater quantity and also quality.

In one pilot province (Ha Nam) were installed a surface water equipment applying modern technology, to measure river/stream cross section, water level and stream volume.

Additional to the equipment to measure the quantity of water resources, all 7 pilot provinces received in Q4 of 2011 mobile equipment to perform water quality analyzes of 8 parameters simultaneously.

Furthermore the project supported in 2011 on both level several technical trainings, workshops and activities on public awareness campaigns for example on WR protection and enhances the understanding about IWRM.

2.3 Key Risks

Risk (describe)	Probabilit	Potential implications	Risk	
	y (score)	Describe	Score	Level (score)
Timely access to data	high	The data collection and assessment depends also on the creation of the interactive	high	D
Lack of number of qualified staff at MoNRE/DoNRE	medium	Salaries for government staff are low and workload is high, so the DoNRE's facing shortage on competent staff.	high	С
Adequate funds for ground- & surface water assessments	high	The costs of the data collection in each province is high. Although the project has allocated a significant amount of funds, project implemen-tation will show whether the funds are limited.	mediu m	С
Willingness to share data and cooperate to create an interactive database	high	The very low willingness to share data was the main reason why MoNRE decided to break down the central DB System to a 7 separated DB which is a big constrain and drawback.	high	D
Data redundancy, IWRM concept and Status Report can not be applied	high	The change from a central server based WRDB to a separated system will hinder the reporting and application of IWRM concept because data are available only in provincial boarders and enhance the risk of data redundancy,.	high	D
Too limited project funds for the Monitoring Network (maintenance and further installation)	high	The installation and maintenance of the WR monitoring network is very costly. The DoNRE does not have so far allocated annual budget (or if they do - it's very limited, with complicated procedures) for these purposes and the project budget is limited. A large number of	high	D

		monitoring stations proposed but not yet established or with no equipment. This pose a high threat to sustainability of the network.		
Difficult to find suitable trainers, especially in IWRM - in-country	high	Limited training capacity in the MoNRE and little willingness to hire outside expertise.	high	D

2.4 Key lessons learned and recommendations

- The development of technical guidelines on central level is a demanding task with a slow process because of the large participant group and difficult to harmonize the various interests from several stakeholders. However the strong participative approach includes the option for a higher acceptance and sustainability of the product. Another observation is that the technical inputs from international experts seem to be not very welcome and desired. The acceptance for technical guidelines shows a higher success when they are developed by national experts.
- In general the most workshops and training are executed in form of "frontal lessons", mainly using simple presentations (lectures). Dynamic trainings, with work-groups, practical exercises and field visits are not desired by the DWRM/MoNRE. This old training style is well known to have a very low learning efficiency and sustainability for the participants. The PSU already recommendeded to the PMU to change the training methodology.
- The change in the approach of the water resources database, from a central server based system to a distributed system with eight separated servers and databases, caused a considerable delay in the development of the water resources information system and additional tasks for the national and international IT experts. The future (2012+) maintenance of the WRDB will be very difficult. So far exists no strategy in the MoNRE how to interchange in future the information/data of the several databases or how to connect further provinces (DoNREs) with the WRDB and WRIS.

Its strongly recommended to reconsider the decision of a "distributed database" system and come back to the central server based system.

- The central PMU should give faster and clearer instructions towards the PPMUs. Many delays (in activities carried out on provincial level) for example in preparing the WR Monitoring Plans, the annual Planning or data collection, are also caused by the slow and not precisely communication CPMU-> PPMUs.
- On the other hand the CPMU should be more pro-active and ask for assistance or clarification if question or confusion comes up.
- From the start of the project should have been developed a Financial Guideline to assist the PPMUs in the implementation procedures. Many accountants and directors suffered uncertainness on how to deal with the project budget and CPMU has not given always apparent instructions.

3 Analysis of the intervention

3.1 Context

To describe the most significantly (positively or negatively) influences on the "progress of the intervention", it is necessary to underline that this project is a *NEX* project, which is abbreviation of "national execution". With this modality, the governmental counterpart(s) are taking the leading role in all aspects of project executuion, which includes management and implenmentation. The term of "intervention", such is defined as interference, is dubious because the philosophy of NEX is not to intervene, but to enhance the ownership of the stakeholders by enforcing existing national structures and frameworks, to set up and support an environment for sustainable development, following the country and culture context.

In NEX projects the CTA has only an advisory function but no signature power on implementation activities. The procurement is following national rules. In general NEX is designed to give more power and responsibility to the partner management unit, which definitely strengthens the ownership, but may also slow down the implementation and makes the *intervention* less steerable and controllable from the donor side.

The assessment of the execution modalities is quite complex, because this project consists of 8 Project Management Units on 2 levels (central and provincial level). All decisions for the project activities must be coordinated, decided and approved by the MoNRE, then by the DWRM, the central PMU and later on the final decision will be communicated to the seven provincial PMU's.

This decision taking process can be quite effective, because at once 7 PMU's are managed, but also causes delays in the implementation if the decision making stakeholders can not agree on time.

3.1.1 Evolution of the context

To analyse the dynamics between the achieved products and the likely achievement of the specific objectives it is necessary to understand that the TFF and logical framework was designed in 2007, almost 1,5 years before project started and the institutional landscape had changed over the last 5 years.

For this reason the project responds dynamically with changing scopes and activities (e.g. in the WRDB development), regarding their actual need, which can be followed up with the PSC meeting minutes and quarterly reports. All adjustment regarding the project results and activities described in the chapter 3.3.

In the following are listed the elements that have had a significant influence on the logic of the intervention, and in particular on the results (e.g. specific objective), but which are not caused by the direct project:

- However 2011 was marked by a worldwide economic recession, the economical development in Vietnam is still growing fast and leads to a higher need and consumption of Water Resources in general, in particular causes high pressure on the hydro power sector. While the stress on the water (natural) resources is

rising, the project tries to follow-up with the increasing demand to assist the MoNRE in facing their present problems on WRM. However these dynamic processes demand more flexibility for the PMU and may cause changes in the implementation matrices;

- "Climate Change" and Global Warming becomes every year a higher priority and should be included in WR strategies, however the running project has no results or direct measurements designed to answer this demand, except the fact that many of the new constructed groundwater monitoring station are located close to the coastal line and equipped with data-logger which includes conductivity to follow up in future the change of the groundwater table and salinity caused by the expected sea-level rise. The aspects of CC in IWRM should be taken in consideration and included in the new activity and action plans;

- During the identification of the new ICP, BTC-HQ unfortunately did not consider sufficiently the importance of Water Resource Management (IWRM) and consequently did not include in their national strategy paper "ICP 2011-2015" further truly IWRM interventions/projects. In the ICP the Water Sector mainly focused on "urbanisation" and "through infrastructure works", also mixed up in the same document the WR sector with Climate Change issues. That reflects that in BTC HQ exists little awareness about the importance of WRM. This may have a negative effect on the present and future planed projects;

- So far in Vietnam exists no or little national donor coordination on the WRM "sector", which may leads to double efforts and redundancies in activities and implementations. However the international stakeholder try to coordinate as good as possible, but the government doesn't take the chance to lead and channel the effort from the international community.

3.1.2 Institutional Anchoring

The institutional anchorage of the implementation is very strong as it is located on the central level, means in the MoNRE, its DWRM and line departments (DoNREs) at provincial level and the alignment with national strategy on water resources management is very appropriate.

3.1.3 Execution Modalities

In addition to the ownership discussed in section 3.1, the execution modality is appropriate also when considering the country context of Vietnam where decisions are often taken in a top-down approach and the government appreciates to have the control over the implementation. On the other hand however, NEX questions the role of the ITA and the efficiency of the Belgian assistance. So far, this type of NEX project could be considered as a more "budget support" rather than an equivalent cooperation.

3.1.4 Harmo-dynamics

The influence of other actors on the dynamic of specific project objectives is quite low, because there are only few actors in the WRM Sector in Vietnam. However programs of the big actors e.g. Worldbank or ADB have influences on the project results. The review of the new Water Law was an initiative supported since 2009 by the ADB. When ADB support stops, MoNRE decided to follow up using resources from CAPAS project. This means the MoNRE takes advantages of the present project to proceed with important products always when they fit in the project context.

From the project side, the harmonisation with other partners, especially international, is considered crucial and always intended, especially during the development of similar products. Best example is the creation of the water resources database, which has strong synergy with other international partners such as BGR and MoNRE agencies and their strategies.

3.2 Specific objective

The "CAPAS" project has 4 specific objectives and 7 results, which are described in the following chapters.

3.2.1 Indicators

Indicators	Baselin	Progress	Progres	Target	End	Comments
	e value	year N-1	s year N	year N	Target	
Aspect of water resources integrated in Five Year Plan 2011-2015 in each province	no baseline available	0	25%	30%	50%	The provincial WR Monitoring Plans, developed in 2011 with a vision of 2012 are available in all 7 provinces. This, together with the groundwater protection plan, will help to mainstream water resources aspects to the five-year plans of the provinces.
Reports extracted from the interactive water resource database are used for social economic development planning Specific objective: : To improve the d	0	0	20	20%	100%	So far do not exist any national template for reporting on the WR Status. For this reason the DB can not be applied. In late Q4 of 2011 was recruited an expert team to develop the first WR Report Template.
Specific objective To improve the a	evelopmen	and protect			3 5	
Policy measures to improve water resource conditions in the province	no baseline available	0	25%	30%	50%	The project support to set- up a provincial WR Monitoring Network and development of the provincial WR Monitoring Plan has certain influences on the provincial policy measurements
Provincial five years social economic development plan includes surface and ground water resources development and protection plans	no baseline available	0	10%	20%	50%	in 2011 first activities on provincial level were launched to define groundwater protection zones and on central level a guideline is developing

Specific objective: : To improve public	c awarenes	Specific objective: : To improve public awareness about the protection of water resources							
Communities understand different measures for water resources protection	no baseline available	increasin g	increase d	increase d	increase d	Not a clear to measure indicator			
Measured by number of the public awareness campaigns conducted annually in the Program provinces	0	10	10	10	10	The project supports successfully in all 7 provinces a series PA campaigns			
Reduction in dumping wastewater and solid wastes in water bodies	no baseline available	-	-	-	-	No monitoring system to measure this indicator			
Specific objective: : To increase MoNI	RE/DoNRE	s staff capa	city in wate	r resources	manageme	ent			
Visibility of DoNRE increased in the provinces	no baseline available	increasin g	increase d	increase d	increase d				
Number of professional staff working on water resource management at DoNRE increased, be able to enter data, information into interactive data base and making report on water resource conditions	0	15	25	25	25	Staff who is able to input WR data is increased during project implementation permanently			
Reports on water resources are used for provincial social economic development planning	0	0	0	7	7	So far do not exist any national template for reporting on the WR Status. For this reason the DB can not be applied			

3.2.2 Analysis of progress made

To analyse the relation between the project results and the specific project objectives, it is necessary to interpret the dynamics between them. The objective on WR planning for example has a good correlation with the result 5, to enhance the WR Monitoring Network, because the elaborated provincial Monitoring Plans forms part of the provincial planning and is an important tool for the DoNRE and PPC. Given the completion of provincial monitoring plans, the quantity of monitoring stations established and equipment has been installed, it can be considered that this component has reached considerable progress set out at the project start.

The Result 3 and the second specific objective also has a strong dynamic linkage. So far the protection of water resources in Vietnam is still under discussion. In the previous years it included also surface water sources, but now the MoNRE decides to focus on groundwater extraction works for human consumption only, which will have also an impact on the protection zones to develop (in size and quantity).

Public Awareness campaigns are one of the most successful results of the project, however difficult to measure with the given indicators. Each campaign has her own dynamic and vary quite in number of participants target group and time for implementation. So the number of campaigns doesn't reflect automatically the success or impact.

Staff Training of cause is one of the core results of this project, however in the last 2 years the training topics moved a bit away from pure technical trainings towards legal training, trainings on internal tools of the MoNRE for a better understanding of the WRM. This part of the capacity building is not listed in the

logical framework and their indicators and cannot be linked to report or database management.

Particular in 2011 has been executed a large number of mutual and individual trainings on the use of the WR database and the number of people who can and could use it has increased dramatically. However the access to DB is still limited, because of the "Distributed DB approach".

3.2.3 Risks and Assumptions

Risk (describe)		Potential implication	ns	Risk	
	Probability (score)	Describe	Score	Level (score)	
The provincial WR Planning will not improve after 2012	low	During the project activities the DoNRE passed several exercises to learn how to create a WR Plan. Its quite probable they can proceed after 2012	high	В	
Groundwater Protection Zones are not included in the provincial 5 years planning	low	The 5 years planning of the WR resources is responsibility of each DoNRE and PPC. The DoNRE also issue the protection zones, so its likely they will be included.	high	В	
Too limited campaign funds	medium	All DoNRE received sufficient capacity to implement PA by them own. Other financial sources can be identified.	medium	в	
Lack of number of qualified staff at MoNRE/DoNRE	medium	Salaries for government staff are low and workload is high, so the DoNRE's facing shortage on competent staff.	high	с	

3.2.4 Quality criteria

Criteria	Score	Comments
Effectiveness	В	In general the intervention slows down in some aspects and certain moments, but when activities started to be implemented, mostly with a high efficiency.
Efficiency	В	However in the "way-how" the intervention is implemented, e.g. the development of tools and training activities could be performed with more efficiency.
Sustainability	В	Because of the very high ownership the

		sustainability – so far measurable - is good.
Relevance	А	All specific objectives and activities have a high priority to the counterpart and to all involved stakeholders.

3.2.5 Potential Impact

All specific project objectives will contribute to sectoral objectives to enhance the IWRM on central and on provincial level. Especially the development of Standards, Tools, Systems and Networks, the instalment of knowledge and experience will have positive impact for the counterpart and assist to reach the general objective: "To strengthen institutional arrangements and build capacity within MoNRE and its DoNRE's". The enhancement of institutional capacity (which should be understood that it includes both staff/institution capacity and tools and equipment) and public awareness can be considered as the most potential positive impact of the project.

3.2.6 Recommendations

Recommendations	Source	Actor	Deadline
To cope with the lack of number of qualified staff at MoNRE/DoNRE it's necessary to increase the national salaries for the technical staff and to identify more staff places in the annual and five year planning of the DoNRE.	3.2.3	PPC	Q4 2012

3.3 Result 1

3.3.1 Indicators

Result 1: Comprehensive ground- and surface water assessment carried out in 7 provinces							
Indicator	Baseline value	Progress year N-1	Progress year N	Target year N	End Target	Comments	
Existing conditions of ground- & surface- water (quantity, quality, demand pattern) for each province are clearly defined to support strategic decision-making.	No baseline available	50%	80%	80%	100%	The activity on the data collection proceeds in each province and the digitizing of the collected data has started in late 2011. Furthermore a technical Guideline has been drafted to support the data assessment.	

3.3.2 Evaluation of activities

Activities		Prog	ress:		Comments (only if
	А	В	С	D	the value is C or D)
A1.1.2 Agreement on standards for monitoring and assessing water resources			x		Slow progress because many stakeholder/ agencies are involved
A 1.2.3 Data assessment in the provinces and collecting existing information		x			Ongoing process
A 1.2.4 Reviewing and digitizing existing data			x		Central DB System was reduced to a "distributed" system which delays instalment and accessibility
A 1.2.5 Training on methods and skills assessment of water resources			x		Because Guideline has not been finalized, training could not be performed as planed.
A 1.2.6 Submit ground/surface water status report to MoNRE				x	In 2011 was no template for reporting available.

3.3.3 Analysis of progress made

Main constrain which causes delays in this result is the missing format about what information a status report about the conditions of water resources (surface water and groundwater, in quantity and quality) should include. However in 2010 all PMU's where provided with a "data catalogue" in VNese language, a detailed listing of all relevant data which are necessary to collect and asses and in the workshop on the 20 of April 2011 "Data collection on water resources" in Hung Yen was this topic deepened, it would have been facilitated the whole process when a clear data template would have been created in a preview stage.

Following the logic of the process the Guideline on Standards for Monitoring and Assessing Water Resources (A 1.1.2) should have the function to provide guidance, but because of the complexity and multi-stakeholder approach, this guideline is still in draft.

The missing template also effects the reporting. In Q4 2011 was decided to overcome this constrain by setting up a mixed expert group (national and international) to create several templates for the status report on WR.

Risk (describe)		bility Potential implications		
	(score)	Describe	Score	Level (score)
Timely access to data	high	The data collection and assessment depends also on the creation of the interactive data base and the preparation of the WR assessment guidelines which both are time costly.	high	D
Adequate funds for ground- & surface water assessments	high	The costs of the data collection in each province is high. Although the project has allocated a significant amount of funds, project implemen- tation will show whether the funds are limited.	medium	С
Delays in approvals	medium	The project generates various documents and guidelines which need to be used for further implementation at the provincial level. The MoNRE must review and approve which causes delays.	medium	В

3.3.4 Risks and Assumptions

3.3.5	Quality	criteria
3.3.3	Quanty	GILEIIA

Criteria	Score	Comments
Effectiveness	С	Because of uncertainness about the most relevant information and difficulties to access the available data the effectiveness is quite moderate.
Efficiency	С	The data collection must follow Vietnamese cost norms and is quite expensive, so that relative small data packages cause high prices which is not very efficient.
Sustainability	В	However when the project funds stop to support the data collection, the creation of the guidelines, templates, catalogues and capacity building for the technical DoNRE staff put them in the position to proceed in future projects.

3.3.6 Budget execution

See annex 7.3

3.3.7 Recommendations

Recommendations	Source	Actor	Deadline
The DoNRE Director in cooperation with the PPC and the TA team ought to take a very active role in mobilizing key stakeholders to obtain the necessary information and create assessment tools in time.	3.3.4	PPMU's, PPC, PMU	Q2 2012
The existing expert group should be reduced to development of those standards. International expertise seams to hinder the process and should be reviewed if only national experts work on the guidelines.	3.3.4	CPMU	Q1 2012
However the PSU already assist the PPMUs in indentify the most relevant information, simple and clear data sheets (templates) must be created to facilitate the data collection and reporting	3.3.4 and 3.3.5	CPMU, PSU	Q1 2012
The strong ownership from MoNRE and the high engagement of the SC Chairman provide project with priority status.	3.3.4	Vice Minister MoNRE	Q1-Q4- 2012
After a successfully demonstration of the positive effect of implemented project pilot activities, could spur the PPC to allocate more funds for the coming years in the DoNREs.	3.3.4 and 3.3.5	PPC	

3.4 Result 2

3.4.1 Indicators

Indicator	Baseline value	Progress year N-1	Progress year N	Target year N	End Target	Comments
WR databases operating interactively	No interactive database was available	80%	100%	100%	100%	The database was developed in 2010 to run on a central server so all DonRE's (or other partner) can connect via Internet and share the data. Since Q2 2011 MoNRE insisted to create separated database which causes a series of constrains.

3.4.2 Evaluation of activities

Activities		Prog	ress:	Comments (only if	
	А	В	С	D	the value is C or D)
A 2.1.1 National Data and Web Expert			x		Until may 2011 good progress, but after the leaving of the national expert no replacement was assigned.
A 2.1.2 Creating the WR Database and the WR System		x			Database finalized and operational – WRIS in draft version functional.
A 2.1.3 Organizing workshops to define the structure and parameter of the database		x			concluded
A 2.1.4 Purchasing Software		x			concluded
A 2.1.5 Workshops on agreement for data exchange				x	Because of the change in the approach of the DB still pending

3.4.3 Analysis of progress made

The change in the approach to the database system, from a central server based database, which allows a unlimited amount of user to share the same information, to a "Distribute Database System" has a huge impact of the whole result.

Following the MoNRE request expressed in March 2011 by the Vice Minister and confirmed on the consultancy workshop ("Consultation on the WR Database to serve for IWRM") in Hanoi, 5th April 2011, the project supported the purchasing of 7 "Mini Server" also the installation and training in use for each DoNRE in the 7 pilot provinces.

However there still exist the central server WR Database, installed on a server in the DWRM, but this DB (which could be used by Internet) now is limited for training purposes and access only by the technical staff of the Centre of Information Technology of the DWRM.

The 7 server operated isolated and so far there exist no strategy how to integrate or interchange these database, which technical is possible but to trivial.

Furthermore all IT expert contracts stopped end of 2011 (international, national and external), so the DWRM and MoNRE must take decisions how to follow up with the maintenance and data handling of the WRDB.

Risk (describe)	Probability	Potential implications		Risk
	(score)	Describe	Score	Level (score)
Willingness to share data and cooperate to create an interactive database	high	The very low willingness to share data was the main reason why MoNRE decided to break down the central DB System to a 7 separated DB which is a big constrain and drawback.	high	D
Data redundancy, IWRM concept and Status Report can not be applied	high	The change from a central server based WRDB to a separated system will hinder the reporting and application of IWRM concept because data are available only in provincial boarders and enhance the risk of data redundancy,.	high	D

3.4.4 Risks and Assumptions

3.4.5 Quality criteria

Criteria Score Comments

Effectiveness	С	Because of change in the approach concept a "Distributed Database" System is not very effective.
Efficiency	С	The Distribute Database System also is more costly and need more human resources, hardware etc., which lowers the efficiency in comparison with a central server based WRDB.
Sustainability	D	It is very unlikely that all 7 DoNRE have sufficient competent man power to maintain their database.

3.4.6 Budget execution

See annex 7.3

3.4.7 Recommendations

Recommendations	Source	Actor	Deadline
Its strongly recommended to reconsider the decision for a Distributed DB Sysetm and come back to the central Server based DB	3.4.4 and 3.4.5	MoNRE	
The MoNRE must take decision how to proceed regarding the data exchange in the "Distributed DB System".	3.4.4	MoNRE	Q1 2012
The MonRE should allocate funds to train and recruits sufficient IT staff for the maintenance of the 7 databases.	3.4.5	MoNRE/ DWRM	Q1 2012
Furthermore is recommended to increase the functionality of the WRDB and WRIS by creating more assessment tools by search for additional cooperation or funds from other partners, in particular ADB or BGR.	3.4.4 and 3.4.5	MoNRE/ DWRM	Q1 2012

3.5 Result 3

3.5.1 Indicators

Result 3: The IWRM concept, including decision-making protocol, developed and pilot-tested in selected provinces

Indicator	Baseline value	Progress year N-1	Progress year N	Target year N	End Target	Comments
Specific IWRM measures/approaches are implemented in pilot province(s) and the lessons-learnt and recommendations are documented for future replication and mainstreaming into provincial policy	No IWRM council existing	10%	30%	80%	100%	So far no IWRM concept has been developed which should be the guidance for the IWRM implementation.

3.5.2 Evaluation of activities

Activities	Progress:					
	А	В	С	D	the value is C or D)	
A 3.1 Development of the IWRM concept				x	Very slow because of late recruiting of the competent VNese editor team (Q3 2011).	

3.5.3 Analysis of progress made

With distance the weakest result in the project is the development of a VNese Tool book for the IWRM concept and their application. The DWRM recruited lately a editor team in Q3 of 2011 which will need until Q2 2012 to finalize the IWRM concept. Meanwhile the PMU decided to use the funds of this result to support related activities to support the DoNRE. However, it is fortunate that finally a competent editor team was found and contracted and the progress will largely depend on how the booklet be piloted at provincial level.

3.5.4 Risks and Assumptions

Risk (describe)	Probability	Potential implications	Risk	
	(score)			Level (score)
IWRM Concept not applied	medium	To incorporate IWRM at the provincial level is a task which should start with the fully understanding how to apply IWRM issues. But this knowledge is rarely.	Medium	В

3.5.5 Quality criteria

Criteria	Score	Comments
Effectiveness	D	Too much time was needed to identify competent author and editing team to develop a VN version for a IWRM Toolbook.
Efficiency	С	Low disbursement on little process leads to low efficiency.
Sustainability	В	Once the concept created, trained and applied this might be a very important and useful tool for all stakeholder.

3.5.6 Budget execution

See annex 7.3

3.5.7 Recommendations

Recommendations	Source	Actor	Deadline
Case studies of IWRM should be exanimate in countries where application is visible in field and comparable with application in Vietnam. Also the IWRM concept paper has to be worked out in VN language and understandable content, as training material. IWRM small application sites have to be identified in pilot areas.	3.5.4 and 3.5.5	CPMU, PPMU's, PPC	Q3 2012

3.6 Result 4

3.6.1 Indicators

Result 4: A Water Resources Develo	pment and Pi Baseline value	Progress year N-1	lan develo Progress year N	ped in 7 p Target year N	End Target	Comments
Water resources development and protection plan	No baseline available	50%	75%	80%	100%	Before developing plans, first the technical guidance and the legal framework have to be created. This Guideline is currently still in draft, but final version is coming out by the end of February.

3.6.2 Evaluation of activities

Activities	Progress:			Comments (only if	
	А	В	С	D	the value is C or D)
B 1.2 Development of Guideline for GW Protection Zones			x		Slow because of national consultancy
B 2.1.1 Preparing the WR Monitoring Plan for each province		х			concluded

3.6.3 Analysis of progress made

The progress in this result is divided in the 2 main activities, B 1.2 to develop of protection plans for groundwater and B 2.1 the monitoring plans for WR which are also necessary for the implantation of protection measurements.

Regarding the protection of WR the MoNRE decided in to focus on the protection on "extraction works" on groundwater and springs for human consumption. The technical Guideline, which is the baseline for the application, is restricted to those water sources and in 2011 were hold the last consultancy workshops (in May and November).

The development of the monitoring plans for WR on provincial level was one of the main exercises for the provincial PMU's and showed how difficult it is for them to produce such a planning document. For this reason the DWRM decided to issue the monitoring plans with a vision 2010-2012.

The monitoring plans are the baseline and foundation for all further activities in the result 5, regarding the purchase and installing of the monitoring equipment for the WR Monitoring Network.

Due to limited fund, it is also expected that other donors will consider providing support to these monitoring plans after project ends.

3.6.4 Risks and Assumptions

Risk (describe)	Probability	Potential implications	Risk	
	Describe	Score	Level (score)	
Adequate and accurate data are not available		To incorporate IWRM at the provincial level is a task which should start with the fully understanding how to apply IWRM issues. But this knowledge is rarely.	medium	В

3.6.5 Quality criteria

Criteria	Score	Comments
Effectiveness	С	Too much time was needed to develop the guidelines and monitoring plans.
Efficiency	С	The reduction of the Protection Guidance on only groundwater and springs and the WR Monitoring Plan's only until 2012 reduces the efficiency of those documents.
Sustainability	В	Because the establishment of Protection zones for WR is a very new concept in Vietnam this guideline will be very useful for future implementation, even maybe anchored in the water law. The WR Monitoring Plans can be used for the next year and easily adjusted future planning.

3.6.6 Budget execution

See annex 7.3

3.6.7 Recommendations

Recommendations	Source	Actor	Deadline
Its recommended to add in a second version (i) groundwater protection zones in bigger scales, means upstream in the recharge area and (ii) include also surface water, river boarders, wetlands and lakes (ponds). IWRM small application sites have to be identified in pilot areas.	3.6.5	MoNRE	

3.7 Result 5

3.7.1 Indicators

Indicators	Baseline value	Progress year N-1	Progress year N	Target year N	End Target	Comments
Water resources and environmental monitoring data available	No baseline available	25%	75%	80%	100%	Groundwater Monitoring Station producing data about water table and water quality.
More discharging fees collected	no baseline available	0	0	0	0	Monitoring Network still in development.

3.7.2 Evaluation of activities

Activities		Progress:			Comments (only if
	А	В	С	D	the value is C or D)
B 2.1.1 Preparing the WR Monitoring Plan for each province		x			
B 2.2.1 Drilling GW Monitoring Stations		x			
B 2.2.2 Purchasing Monitoring Equipment		x			

3.7.3 Analysis of progress made

In 2011 were all provincial WR Monitoring Plans developed, further groundwater wells drilled and equipment purchased, installed and the technical staff received first training in the usage.

End of 2011 were the first data generated from the groundwater station and can be entered in the database to analyse groundwater drawdown and the development of the conductivity of the water.

3.7.4 Risks and Assumptions

Risk (describe)	Probability Potential implications (score) Describe S			Risk
			Score	Level (score)
Too limited project funds for the Monitoring Network (maintenance and further installation)	high	The installation and maintenance of the WR monitoring network is very costly. The DoNRE does not have so far allocated annual budget for these purposes and the project budget is limited.		D

3.7.5 Quality criteria

Criteria	Score	Comments
Effectiveness	В	Too much time was needed to develop the guidelines and monitoring plans.
Efficiency	С	Drilling and Installation of equipment is quite costly in comparison with international prices/standards.
Sustainability	С	Main constrain are the maintenance cost.

3.7.6 Budget execution

See annex 7.3

3.7.7 Recommendations

Recommendations	Source	Actor	Deadline
Based on the existing WR Monitoring Plans the DoNRE's could identify other partners or donors for further support to enhance the Monitoring Network with their funds.	3.7.4	DoNRE, PPC	
The PPC should allocate funds for the coming years in the DoNREs for the maintenance.	3.7.5	PPC, DoNRE, MoNRE	Q4 2012

3.8 Result 6

3.8.1 Indicators

Indicators	Baseline value	Progress year N-1	Progress year N	Target year N	End Target	Comments
Implemented public awareness campaigns	No campaigns before 2009	100%	100%	100%	100%	Most successful CAPAS component/result

3.8.2 Evaluation of activities

Activities		Prog	ress:	Comments (only if	
	А	В	С	D	the value is C or D)
C 1.2 Implementation of Public Awareness campaigns		x			
C 1.3 Assisting MoNRE in the Implementation of PA campaigns		х			

3.8.3 Analysis of progress made

In 2011 were executed around 25 activities regarding the public awareness with focus on IWRM and water protection. The progress is very good and shows an ongoing interest and demand from all involved stakeholder.

3.8.4 Risks and Assumptions

Risk (describe)	Probability	Potential implications	Risk	
	(score)	Describe	Score	Level (score)
Campaign will not proceed after project phase	medium	Limited funds can hinder the continuation on the PA campaigns.	Medium	В

3.8.5 Quality criteria

Criteria	Score	Comments
Effectiveness	В	In time and because of the high interest of all stakeholder was the implementation
Efficiency	В	Even with relative small budgets were executed activities that had a big impact and target group.

Sustainability		Civic society and professional organizations are sufficient trained to apply PA campaigns in future by them self.
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3.8.6 Budget execution

See annex 7.3

3.8.7 Recommendations

Recommendations	Source	Actor	Deadline
The PPC should allocate funds for the coming years to execute PA campaigns.	3.8.4	PPC	Q4 2012

3.9 Result 7

3.9.1 Indicators

Result 7: A series of staff training courses implemented in key WRM areas						
Indicators	Baseline value	Progress year N-1	Progress year N	Target year N	End Target	Comments
Implemented staff training programs	No baseline	50%	75%	100%	100%	MoNRE doesn't follow up very closely with the agreed training calendar and change often training topics, dates and venues.

3.9.2 Evaluation of activities

Activities	Progress:			Comments (only if	
	А	В	С	D	the value is C or D)
D 1.2 Study Tours			x		Only a small study tour was organized, so the main budget is not used.
D 1.3 Staff Training			x		Delays in organizing the planned trainings.
D 1.4 Planning workshops		x			

3.9.3 Analysis of progress made

In 2011 was the first time that the PPMU's could execute their own training activities, which was quite successful.

However the implementation of the Capacity Building activities on central level is slow, though many changes and adjustments in the Training Calendar (caused by the MoNRE or CPMU). On the other hand many trainings are "booked" on corresponding activity budget-lines in other Results, e.g. on Result "2" for the WR database training and WRIS establishment. This is another reason why the direct disbursement in this Result budget lines (D.x) seems to be low.

Risk (describe)	escribe) Probability			Risk
	(score)	Describe	Score	Level (score)
No suitable trainers available in- country	high	Limited training capacity in the MoNRE and no willingness to hire outside expertise.	high	D

3.9.4 Risks and Assumptions

3.9.5 Quality criteria

Criteria	Score	Comments
Effectiveness	С	The executed trainings are not always very effective because the applied training methods are old fashion and the used trainer not very competent.
Efficiency	С	The correlation between budget effort and capacity building is in general from quite low efficiency.
Sustainability	С	Because of no real capacity building strategy in the DWRM it's unlikely the DWRM or DoNRE will proceed with training activities in future. Another constrain are the fluctuation of technical staff, trained staff tends to find better paid position outside the government.

3.9.6 Budget execution

See annex 7.3

3.9.7 Recommendations

Recommendations	Source	Actor	Deadline
Adjust training methods on "workshops" (which in reality are events with speeches) towards a more modern and dynamic education style, including interactive session (discussions), working groups, giving space and task for presentation of the participants, practical exercise, field trips, etc	3.9.5	MoNRE	Q2 2012
Reduce the "in-house" trainings (training executed by the beneficiary them self who are not skilled Trainer) instead outsourcing training to professional third party institutions (like national and international training centres, institutes and universities, e.g. <i>InWent</i> , GIZ).	3.9.4	MoNRE	Q2 2012

4 Transversal Themes

4.1 Gender

The term "gender" refers to women's and men's different roles, resources, and experiences – aspects of culture that all of us learn in our own societies as we grow up. In water sector, women are considered as water users as well as water and livelihood managers.

Under guidelines of this report and the framework of CAPAS activities, gender objective falls into gender-neutral and gender sensitive degrees because of project's characteristics:

- Project creates technical supporting tools on water accessing and management at high level (central and provincial levels) such as technical guidelines on monitoring and evaluation of water, IWRM guidelines, groundwater protection areas, equipments and database and information system;

- Communication and capacity building activities mainly focus on dissemination information and results from technical components and basic knowledge on water resources management.

- Female students and teachers are strongly encouraged in awareness activities in the model "Our river clubs" in lower secondary schools in 7 provinces

- Women are key stakeholders joining the community events under the awareness activities of the model "Self-managed river sections" in 4 provinces in the North.

- Both women and men participate awareness activities of "Village-regulations on water protection" in 3 provinces in the Central.

- Female staff in 7 CAPAS PPMUs normally take lead the CAPAS communication and training activities.

- Because the unique characteristic of water sector in Vietnam, most of water resources staff in provinces as well as in central agencies are men. Thus, CAPAS technical training's participants are mainly men (about 90%).

4.2 Environment

As governed by the overall objective, four specific objectives and under which are the seven expected results areas (as outlined earlier), environment is always brought into as a whole or part of the interventions, in different ways, and at different degrees.

There are 3 categories of interaction with / impact to environment to be analyzed, as described below.

On the one hand, it is a fact that every project has various daily managerial activities that require transportation and the use of energy and water as well as produce wastes, and this project is not an exception. All these elements can be quite "sensitive" to the environment. With nine bodies (steering committee;

central project management unit and project support unit; and seven provincial project management units) of a total of nearly one hundred staff, the routine operation and transportation by different means (airplane, car, motorbike etc) consume considerable amount water, electricity, fossil fuels, stationeries and materials. In that sense, an "environment friendly" or "green" operation practice has been introduced and implemented.

It should also be mentioned that Result #5 involves development of infrastructures which are the drilled wells for groundwater monitoring. These wells are ranging from 10 to a hundred meters deep, running through various underground layers and aquifers. Therefore, if not conducted properly, they can pose unwanted negative impact to the aquifers and consequently - human.

On the other hand (and more likely - more dominant and important) - it can be stated that every intervention of project is explicitly aiming towards to addressing different water resources and environment issues through diverse institutional and technical approaches. This can be seen by scanning through the course of specific results and activities of the project, as follows.

With Result #1: A comprehensive ground and surface water resources data collection and assessment carried out at central level and especially in 7 provinces helped to have a more reliable picture about the resource from which - making sounder decisions in planning and management.

With Result #2: With an interactive water resources database and information system made operational at DWRM/MoNRE and 7 provincial DoNREs, the authorities now have an important source of data and information together with powerful tools to assist them better performing their jobs and mandates in protecting the waters and environment.

With Result #3: As Integrated Water Resources Management (IWRM) is still a very new in Vietnam, the development of a guidelines (in form of a booklet) including decision-making protocol and demonstration implementation in selected provinces are seen as an important steps forward in promoting this approach in which understanding and capacity of authorities and stakeholders on how to manage water across the sectors and in integration with other resources and elements of the environment is substantially enhanced.

With Result #4: A guidelines for water resources protection (that takes into account international experiences in local context) has been produced at central level and then demonstrated in all 7 provinces. This helps to lift up the capacity of national and provincial authorities in fulfilling their mandates and responsibilities in water protection.

With Result #5: This is one of the central intervention which consists of 2 main elements – hardware (infrastructures and equipment) and software (guidelines for water resources monitoring and assessment; and capacity building). With the hardware, over 7 provinces, 40 groundwater monitoring wells and nearly 20 surface water monitoring points/stations have been established/constructed and all these have been installed with modern and reliable (and costly) equipment. At the mean time, a technical guidelines was developed and trainings have been provided to beneficiaries on how to make the best use of the hardware. With this monitoring system, it is of no doubt that the authorities now have a much more reliable source of water resources monitoring data than ever before which will

largely assist them in their management and decision-making.

With Result #6: In parallel with the technical component, a continuous process of public awareness raising has been initiated and implemented over the whole 7 provinces of the project. This ranges from activities in schools, with communities and mass media - for examples: "Our river club", "Self-management river stretch", "World water day", "Water resources information exchange and orientation for the media", "Water contests" etc - have been organized. This can be seen as the most successful component of the project to date, contributing to substantially change the mind and behaviour of concerned people and stakeholders about and towards water.

With Result #7: This is referred as the "capacity building" component of project under which a large number of workshops, trainings and study-tours in key areas of water resources management have been organized at both levels, aiming at establishing and enhancing knowledge and capacity of involved staff in various technical aspects of water resources management. It is important to note that this component is coupled with activities under Results #1 to #5, and is not restricted to project provinces but instead - has been expanded to much broader beneficiaries nation-wide. This approach has been highly appreciated by the "outside" provinces and stakeholders.

5 Decisions taken by the JLCB and follow-up

Decisions from the so called "Joint Local Consultative Body" (Project Steering Committee) can be found in detail in the corresponding PSC minutes, elaborated after each PCS meeting by the PSU and approved by the PMU.

Main decisions taken by the PSC members, related to adjustments in 2011, were:

Decisions	Source	Actor	Time of decision	Status
Finalize the WR database soon and ensure compatibility	4 th PSC	PMU	Feb., 25 2011	done
Allocate more budget to extend the contract of the international database expert from 01.03 31.10.11		PMU	Feb., 25 2011	done
Allocate more budget for data collection on provincial level	4 th PSC	PMU	Feb., 25 2011	done
Execute Inspection Mission to the 7 Provinces to evaluate progress and efficiency	5 th PSC	PMU	Sept, 16. 2011	on-going
Extend the contract of the international database expert from 01.1131.12.11	5 th PSC	PMU	Sept, 16. 2011	done
Extend CTA contract for 6 month until May 2012	5 th PSC	PMU	Sept, 16. 2011	done
Allocate budget from Study Tour Activity to compensate final payment for the cars	5 th PSC	PMU	Sept, 16. 2011	done

6 Lessons Learned

Lessons learned	Target audience
Projects with the character of institutional strengthening and developing new guidance, tools and systems, means the creation of new implementation tools, should have longer intervention time then 4 years, especially when it is implemented over a large and broad geographical coverage (ie 7 provinces). Furthermore under the country context of Vietnam where "everything takes the double of time than planed" and the possibility of NEX modally in some ways hindering a fast implementation. The recommendation for future projects with similar character is to extend the time frame to at least 6-7 years intervention.	BTC HQ, Res Rep, Belgian Embassy, MoNRE
The role and function of the CTA in NEX projects should be clearly defined from the start of the project.	BTC HQ, Res Rep, Belgian Embassy, MoNRE
For project under NEX modality, Financial Guidelines and Operational Manual should be available before or right at the project start.	BTC HQ, Res Rep, Belgian Embassy, MoNRE
To speed up implementation should be given more flexibility and resources to the provincial PMU's, for instant quite late the PPMU's got their own funds for training and study tours.	MoNRE, PMU

7 Annexes

7.1 Logical framework

	Logical Frame for: CAPACITY BUILDING IN ASSESSING AND MANAGING WATER RESOURCES					
Log	gic of Intervention	Indicators	Source of Verification	Risk and Assumptions		
General O	eneral Objectiv					
and pro sup mai for	strengthen institutional arrangements d build capacity within MONRE and its ovincial and district bureaus in order to pport the strategic investigation and anagement of regional water resources efficient development so as to reach a Vietnamese Development Goals.					

Specif	ic objective A			
A	Strategic water resources management is improved.		Water Resources Development and Protection Plan and 5-year SEDP 2011-2015 of each province.	 Legal framework will be adapted early 2008 to abolish current misunderstandings about tasks and responsibilities in the sector; Improving the management of water resources is on the agenda of the PPC.
Result	S			
A.1.1	Comprehensive ground- and surface water assessment carried out in 7 provinces.	Existing conditions of ground- & surface- water (quantity, quality, demand pattern) for each province are clearly defined to support strategic decision-making.	Water resources assessment report of each province.	 Provinces show commitment to conduct assessments; Existing data adequate and accurate for assessments; Provincial teams ready to work under guidance from MoNRE and TA team.
A.1.2	An interactive WR system operational at MoNRE and 7 DoNRE's.	 Interactive water ressources database and HEIS system are established, tested and running error-free at central server and are regularly accessed, maintained and updated. Imbedded tools and database are used by relevant authorities for making strategic decisions with regard to water resources management. 	Type and amount of data/information stored in the system and number of reports produced from the system that have been used to support decision making.	 Willingness to share data and cooperate to create an interactive database/system.
A.2.1	The IWRM concept, including decision- making protocol, developed and pilot- tested in selected provinces.	Specific IWRM measures/approaches are implemented in pilot province(s) and the lessons-learnt and recommendations are documented for future replication and mainstreaming into provincial policy.	* Proposal on implementation of IWRM concept(s) * Pilot implementation report, documenting lessons-learnt and recommendations accepted by provincial	 Readiness in each province to cooperate in a IWRM Committee; Readiness of the selected provinces to strategically cooperate in the IWRM Council; Adequate funds available for the institutions represented in the Council to implement the measures that are being agreed.

	Logic of Intervention	Indicators	Source of Verification	Risk and Assumptions
Specif	ic objective B			
В	To improve the development and protection of water resources.	 Policy measures to improve water resource conditions in the province; Provincial five years social economic development plan includes surface and ground water resources development and protection plans. 	Provincial Five Year Plan 2011-2015.	Water resources protection is on the agenda of the PPC.
Result	S			
B.1.1	A Water Resources Development and Protection Plan developed in 7 provinces.	Water resources development and protection plan	Report for each province.	 Adequate and accurate data available; Provincial institutions ready to participate, deliver and cooperate.
B.1.2	CEMDI's water resource and environmental monitoring system applied in 7 provinces.	Water resources and environmental monitoring data available; More discharging fees collected.	Reports on environmental and water resources conditions; Number of payments made.	Mandates, tasks and responsibilities of the institutions concerned clear; Environmental monitoring system developed by CEMDI ready for water resource monitoring.

	Logic of Intervention	Indicators	Source of Verification	Risk and Assumptions
Specif	ic objective C		•	
С	To improve public awareness about the protection of water resources.	 Communities understand different measures for water resources protection; measured by number of the public awareness campaigns conducted annually in the Program provinces; reduction in dumping wastewater and solid wastes in water bodies. 	Campaign Impact assessment reports; Annual reports of Urban Environment Companies, Provincial Center for rural water supply and environmental sanitation.	na
Result	1			
C.1.1	Public awareness campaigns implemented in 7 provinces.	Implemented public awareness campaigns.	Campaign materials.	 Civic society and professional organizations with sufficient experience in the field available in the province to assist with implementing the campaigns; Provinces have adequate funds to implemen professional awareness campaigns.

	Logic of Intervention	Indicators	Source of Verification	Risk and Assumptions
Specif	ic objective D			
D	To increase MoNRE/DoNRE's staff capacity in water resources management.		WR measures and policies.	Adequate number of staff with WR management responsibilities deployed and available for training.
Result				
D.1.1	A series of staff training courses implemented in key WRM areas.	Implemented staff training programs.	Training evaluation reports.	 Suitable trainers available in-country; Training providers available for training in the provinces.

7.2 M&E activities

- 4cd Project Steering Committee Meeting (25.02.2011, Hanoi)
- Financial external Audit 25-28/03/2011 for the period 01/7/2010-31/12/2010 (Deloitte Company)
- Project Mid Term Review (12.05.2011 31.08.2011, Mekong Economics)
- 5thd Project Steering Committee Meeting (16.09.2011, Hanoi)
- Financial external Audit 19- 24/9/2011 for the period 01/1/2011-30/6/2011(Deloitte Company)

Internal M&E:

The PSU created a M&E tool, to provide a modern and powerful follow-up tool, which is based on a central server and accessible via Internet. The "MET" can store all ongoing activities, expenditures; progresses can be dynamically displayed and analysed (see e.g. GANTT diagram for project implementation on central PMU in figure next page).

	Central											
Activ ity	ity Planned Disbursed Start End Progress					2011						
						Jan Feb Mar Apr May Jun Jul Aug Sep Oct Nov Dec						
A.1.1.2	21,160	20,396	30-09-2009	29-12-2011	75 %							
A.1.2.3	99,180	102,607	31-12-2009	30-12-2011	80 %							
A.1.2.4	26,663	31,500	30-03-2010	29-12-2011	25 %							
A.1.2.5	10,000	4,497	31-12-2010	30-12-2011	25 %							
A.1.2.6	9,500	9,500	30-09-2010	29-12-2011	25 %							
A.2.1.1	30,000	15,093	31-10-2009	30-12-2011	50 %							
A.2.1.2	179,500	190,854	30-07-2009	29-11-2011	100 %	1002						
A.2.1.3	16,530	8,777	31-10-2009	30-06-2011	100 X	100%						
A.2.1.5	6,000	0	31-03-2010	30-09-2011	0 %	0%						
A.2.2.3	6,800	6,800	30-06-2010	29-12-2011	80 %							
A.3.1.1	25,754	19,154	31-10-2009	30-12-2011	65 %							
A.3.1.2	5,000	0	01-04-2011	30-06-2011	0 %	0%						
A.3.1.3	12,000	2,679	01-04-2011	31-12-2011	0 %							
B.1.2.0	12,903	5,692	31-12-2010	30-12-2011	85 %							
B.2.1.1	9,285	8,275	01-04-2010	31-03-2011	100 %	1002						
C.1.2	156,150	137,546	31-12-2009	30-12-2011	75 %							
C.1.3	35,000	34,245	01-08-2009	31-12-2011	80 %							
D.1.2	157,500	118,106	01-08-2009	31-12-2011	20 %							
D.1.3	100,649	88,955	01-04-2010	31-12-2011	25 %							
D.1.4	65,200	50,257	01-11-2009	31-12-2011	40 %							
X.1.2	20,000	0	01-01-2011	31-12-2011	0 %							
X.1.3	29,300	29,236	01-11-2009	31-12-2011	90 %							

7.3 "Budget versus current (y – m)" Report

The Regie budget is accounted using FIT and can be find under the budget lines "Z.x".

Budget vs Actuals (Year to Month) of VIE0703411

Project Title : poverty reduction	Strengthening the capacity within Vietnam f	or the assessment and management of water resources as a basis for rural water supply for
Budget Version:	D01	Year to month: 31/12/2011
Currency :	EUR	
YtM:	Report includes all closed transactions unti	I the end date of the chosen closing

	Status	Fin Mode	Amount	Start to 2010	Expenses 2011	Total	Balance	% Exe
Z GENERAL MEANS			893.600,00	364.270,36	173.378,12	537.648,48	355.951,52	60%
01 Personnel			560.400,00	336.272,22	154.732,58	491.004,80	69.395,20	88%
01 CTA		REGIE	450.000,00	293.466,59	130.007,79	423,474,38	26.525,62	94%
02 National Technical Avisor		REGIE	86.400,00	29.930,52	18.673,17	48.603,69	37.796,31	56%
03 Translator cum sectorectary		REGIE	24.000,00	12.875,11	6.051,62	18.926,73	5.073,27	79%
02 Office Equipment			15.000,00	10.039,33	987,55	11.026,88	3.973,12	74%
01 Equipment IT		REGIE	<mark>15.000,00</mark>	10.039,33	987,55	11.026,88	3.973,12	74%
03 Operational means			43.200,00	14.858,42	5.166,22	20.024,64	23.175,36	46%
01 Local transportation		REGIE	24.000,00	7.011,79	989,35	8.001,14	15.998,86	33%
02 Communication		REGIE	9.600,00	1.646,22	1.539,11	3.185,33	6.414,67	33%
03 Office stationary	R	REGIE	9.600,00	6.200,41	2.637,76	8.838,17	761,83	92%
04 Monitoring and evaluation			275.000,00	3.100,39	12.508,49	15.608,88	259.391,12	6%
01 Mid-term review and final evaluation	R	REGIE	75.000,00	0,00	1.446,47	1.446,47	73.553,53	2%
02 External Auditing	R	REGIE	200.000,00	3.100,39	11.062,02	14.162,41	185.837,59	7%
9 Conversion rate adjustment			0,00	0,00	-16,72	-16,72	16,72	?%
98 Conversion rate adjustment	R	REGIE	0,00	0,00	-16,72	-16,72	16,72	?%
99 Conversion rate adjustment	С	OGES	0,00	0,00	0,00	0,00	0,00	2%

The budget for the NEX (national execution) in FIT consists of just one budget line (04). The detailed accountant is done in national the System (BRAVO).

	Budget vs Actuals (Year to Month) of VIE0703411											
Project Title : poverty reduction												
Currency :												
		Status	Fin Mode	Amount	Start to 2010	Expenses 2011	Total	Balance	% Exec			
A TO IMPROVE STRATEGIC W	ATER RESOURCES MANAGEMENT			3.106.399,98	1.747.200,00	880.100,00	2.627.300,00	479.099,98	85%			
01 Comprehensive ground	-and surface water assessment			0,00	0,00	0,00	0,00	0,00	?%			
01 Prepare detailed plans	and guidelines for ground-and		COGES	0,00	0,00	0,00	0,00	0,00	?%			
02 Conduct comprehensiv	e ground-and surface water		COGES	0,00	0,00	0,00	0,00	0,00	?%			
02 An interactive WR datab	ase operational at MoNRE and 7			0,00	0,00	0,00	0,00	0,00	?%			
01 Design the interactive of	latabase		COGES	0,00	0,00	0,00	0,00	0,00	?%			
02 Establish the database	in each project province		COGES	0,00	0,00	0,00	0,00	0,00	7%			
03 The IWRM concept deve	eloped and pilot tested in 2			0,00	0,00	0,00	0,00	0,00	?%			
01 Setting up the IWRM in	stitutional framework in ONE		COGES	0,00	0,00	0,00	0,00	0,00	?%			
02 Developing and docum	enting the IWRM concept		COGES	0,00	0,00	0,00	0,00	0,00	?%			
03 Applying the IWRM cor	ncept		COGES	0,00	0,00	0,00	0,00	0,00	?%			
04 Fund transfer to NEX ac	count			3.106.399,98	1.747.200,00	880.100,00	2.627.300,00	479.099,98	85%			
01 Replenishment to NEX	account		COGES	3.106.399,98	1.747.200,00	880.100,00	2.627.300,00	479.099,98	85%			

7.4 Beneficiaries

The CAPAS project influence potentially on 2 main categories of beneficiaries – direct and indirect.

Direct beneficiaries are counterpart agencies directly involved in the management and implementation of project activities and interventions, including MoNRE and its DWRM at central level and the 7 DoNREs at provincial level.

The indirect category is more diverse, ranging from partner agencies/ institutions who are involved in the implementation of the whole or part of activities/interventions, government and mass organizations who are offered to participate in a number of awareness and capacity building activities, to a wider society and community people who either benefit or being affected from the changes/improvements of water resources management as resulted from the project interventions.

More details and dimensions related to beneficiaries in 2011 are presented in table below:

Beneficiary	Category of beneficiary	Key related intervention	Role of beneficiary in intervention	Change of / impact to beneficiary
Ministry of Natural Resources and Environment (MoNRE)	Direct	Capacity building (study-tours in 2010 to UK/Europe and China)	Organizer	Raising profile of organization Gaining innovative knowledge in water resources management (WRM) Establishing network and relationship for future cooperation
Department of Water Resources Management	Direct	Capacity building (study-tours in 2010 to UK/Europe and China)	Organizer	Same as with MoNRE above
(DWRM)		A number of trainings/workshops on technical and managerial aspects of WRM	Organizer and participant	Enhanced capacity (knowledge and presentation skills)
		Development of technical instruments (such as guidelines for WR monitoring and assessment; WR protection) and plans for WRM (such as WR monitoring plan)	Supervisor and implementer	Enhanced capacity in preparing such instruments as well as capacity in supervision and quality control
		Establishment of WR database	Implementer	Enhanced soft- (capacity in building and managing modern WR database) and hard-component (equipment such as central server)

				Enhanced capacity in
		Construction of WR monitoring works	Supervisor and implementer	construction and supervision of such infrastructures Internalized project fund (in contrary to external consultancy agencies/companies)
		Implementation of NEX (national execution) project	Implementer	Enhanced capacity in management and implementation of NEX projects
		Capacity building (study-tour in 2010 to China)	Participant	Gaining innovative knowledge in water resources management (WRM)
		A number of trainings/workshops on technical and managerial aspects of WRM	Organizer and participant	Enhanced capacity (knowledge and presentation skills)
Department of Natural Resources and	Direct	Development of plans for WRM (such as WR monitoring plan)	Supervisor	Enhanced capacity in supervision and quality control
Environment (DoNRE) in 7 project	Direct	Establishment of WR monitoring works	Supervisor	Enhanced capacity in supervision and quality control
provinces		Organization of awareness raising campaigns	Organizer	Enhanced capacity in designing and delivering such events in collaboration with partners
		Implementation of NEX (national execution) project		Enhanced capacity in management and implementation the provincial components of NEX projects, especially planning
Department of Information Technology (DIT) {under MoNRE}	Indirect	Establishment of WR database	Partner	DIT is responsible for developing overall structure for national NRE database where the WR component is developed by this project (that they just will benefit)
Department of Natural Resources and Environment (DoNRE) outside 7 project provinces	Indirect	Organization of a number of technical trainings/workshops on WRM, legislations, and communication skills for "outside" provinces	Participant	These DoNRE are more aware about WRM legislations as well as more capacitated on communication and technical aspects
Mass media (journalists, newspapers, televisions, radios) at central and provincial level	Indirect	Organization of a number of technical trainings/workshops on WRM, legislations, communication skills and events (such as writing contest) for these mass media beneficiaries	Participant	These mass media beneficiaries understand more about WRM legislations and its management that will enhace their work and involvement in the sector

	r		1	
Mass organizations (youth union, women union, farmer union) at central and provincial level	Indirect	Organization of various public awreness raising campaigns on WRM	Partner	Improving awareness/capacity of these beneficiaries as well as their willingness/motivation and active involvement in water sector
Centre for Water Resources Investigation		Establishment of WR database	Partner / consultant	Mutual benefit for both CAPAS and CWRPI when collaborating to develop groundwater database
and Planning (CWRPI) {under MoNRE} and its Divisions	Indirect	Development of monitoring plans and establishment of WR monitoring works in provinces	Partner / consultant	CWRPI and its Divisions have technical and financial gains when working with CAPAS on WR monitoring plan and works in provinces
Local governments (district and commune level) in 7 project provinces	Indirect	Organization of various public awareness raising campaigns and modalities on WRM	Partner	Improving awareness/capacity of these beneficiaries as well as their willingness/motivation/support and active involvement in water sector
Teachers and students of primary and secondary schools in 7 project provinces and others	Indirect	Organization of various public awareness raising campaigns and modalities on WRM	Partner and implementer / participant	Improving awareness/capacity of these beneficiaries as well as their willingness/motivation/support and active involvement in water sector
Local community people in selected sites of 7 project provinces	Indirect	Organization of various public awareness raising campaigns and modalities on WRM	Participant / purely beneficiaries	Enhanced awareness and willingness/motivation/support and active involvement of these beneficiaries in water sector Local people benefit from improved water resources, in both quality, quantity and its management regime

	CAPAS PI	(00201.0															
Activity				Budget all	ocation 201	1 per PMU j	per activity			Total project							
code	Activity name	Central PMU	Ha Nam	Nam Dinh	Ninh Binh	Thai Binh	Binh Dinh	Phu Yen	Ninh Thuan	budget 2011 per activity							
A	Improving strategic water resources management																
A.1.1.1	Prepare plans and guidelines for ground- and																
A.1.1.2	surface water assesment Agreement on parameters, methodologies,	12.079								12.07							
	procedures, and standards Baseline studies of the actual conditions	12:010								121011							
A.1.2.1	(DoNRE's and Provinces)																
A.1.2.2	Preparing assessment plan for each province Data assessment in provinces and collecting	05.000	0.040	40.004	7.000	40.555	10.007	0.400	40.440	404.07							
A.1.2.3	existing information	95.000	6.343		7.683	12.555	10.307	9.422	10.140	164.27							
A.1.2.4	Reviewing and digitizing existing data Training in assessment methodology and	21.663	1.236	5.000	3.000	5.000	6.327	6.041	6.000	54.26							
A.1.2.5	experience Submit ground/surface water status report to	10.000								10.000							
A.1.2.6	MoNRE	4.505	2.045	2.000	2.000	2.000	2.000	1.000	2.000	17.550							
A.2.1.1	National Data and Web Expert	10.000								10.000							
A.2.1.2	Creation of water resources database/system (International GIS and Data Expert)	64.002								64.002							
A.2.1.3	Execute workshops for definition of database and parameters	6.265								6.26							
A.2.1.4	Purchase software and licenses			102			114			210							
A.2.1.5	Agreement on data exchange	6.000								6.000							
A.2.2.1	Acquire IT equipment to improve water resources management for provinces		665	714	960	714	671	1.200	800	5.724							
A.2.2.2	Install a professional Central Server																
A.2.2.3	Establishment of WRIS system and training in provinces	6.800								6.800							
A.3.1.1	Review and documentation of IWRM concept and preparing pilot implementation plan	17.244								17.24							
A.3.1.2	Workshops for training in the concept/plan	5.000								5.000							
A.3.1.3	Applying the IWRM concept in one pilot river basin	12.000								12.000							
в	Improving the development and protection																
B.1.1	of water resources Preparing the guidance for protection areas for																
	water resources Workshops and training on the guidance of																
B.1.2	protection areas for water resources	12.903								12.903							
B.1.3	Development of water resources protection plans for provinces																
B.1.4	Applying the water resources protection plan in pilot areas		5.000	5.000	5.000	5.000	5.000	5.000	5.000	35.000							
B.2.1.1	Preparing the Monitoring Plan for each province	5.285	1.000	1.000	1.000	1.000	1.000	1.000	1.000	12.285							
B.2.1.2	Preparing ToR and tendering for the needed equipment and drilling for each province																
B.2.2.1	Drilling monitoring wells		42.013	14.371	32.097	39.954	32.269	37.416	25.443	223.563							
B.2.2.2	Acquire the equipment for water quality and quantity monitoring of surface and groundwater		74.937	25.937	25.937	25.937	25.937	25.937	25.937	230.559							
B.2.2.3	Installing the equipment and training staff in the		3.857	2.857	2.857	2.857	2.857	2.857	2.857	20.999							
	field Improving public awareness about the																
с	protection of water resources																
C.1.1	Prepare the communication strategy and public awarness plan																
C.1.2	Implementation of the provincial public awareness campaigns	104.800	14.503	19.300	20.612	18.600	16.931	16.014	22.500	233.260							
C.1.3	Communication and Training Officer (CTO)	14.193								14.193							
D	Increasing MoNRE/DoNREs staff capacity in water resources management																
D.1.1	Assessment of staff capacity (DoNRE's /																
D.1.2	MoNRE) and preparing training plan Study tours	77.317	2.046	1.500	1.500	2.950	2.046	3.531	3.000	93.890							
D.1.2 D.1.3	Staff training	69.033	2.046	4.575	2.700	2.950	2.046	4.321	3.000	93.89							
D.1.4	Team building and planning workshops	16.038	368	300	300	400	368	394	394	18.562							
X	Others																
X.1.1 X.1.2	Acquire a program car Contingency cost	20.000								20.000							
X1.2	Project Accountant and Assistant	13.009								13.009							
	Total budget allocation 2011 per PMU	603.136	156.836	95.477	105.646	119.717	108.650	114.133	108.071	<u>1.411.666</u>							

7.5 Operational planning Q1-2011