

Document of
The World Bank

Report No: ICR00001192

IMPLEMENTATION COMPLETION AND RESULTS REPORT
(Loan No.: IBRD-46970)

ON A

LOAN

IN THE AMOUNT OF US\$180 MILLION

TO THE

THE ISLAMIC REPUBLIC OF IRAN

FOR THE

EARTHQUAKE EMERGENCY RECOVERY PROJECT

June 30, 2010

Sustainable Development Department
Middle East Country Department
Middle East and North Africa Region

CURRENCY EQUIVALENTS

(Exchange Rate Effective May 27, 2010)

Currency Unit = Iranian Rial (IR)

1.00 = US\$ 0.000104

US\$ 1.00 = 9,600

FISCAL YEAR

ABBREVIATIONS AND ACRONYMS

BEERP	Bam Earthquake Emergency Reconstruction Project
BRO	Bam Reconstruction Office
BPTF	Bam Provincial Task Force
EERP	Earthquake Emergency Recovery Project
ERL	Emergency Recovery Loan
GDP	Gross Domestic Product
GOI	Government of Iran
HF	Housing Foundation of the Islamic Revolution
IBRD	International Bank for Reconstruction and Development
ICHTO	Iranian Cultural Heritage and Tourism Organization
IRCS	Iranian Red Crescent Society
IRI	Islamic Republic of Iran
ISA	International Standards on Auditing
ITC	Iran Telecommunications Company
KTC	Kerman Telecommunications Company
MOE	Ministry of Education
MOEAF	Ministry of Economic Affairs and Finance
MOHME	Ministry of Health and Medical Education
MOI	Ministry of Interior
MICT	Ministry of Information and Communications Technology
MORT	Ministry of Roads and Transportation
MPO	Management and Planning Organization
NSTF	National Disaster Task Force
NGO	Non-Governmental Organization
TCI	Telecommunication Company of Iran
UNDP	United Nations Development Program

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Islamic Republic of Iran
Emergency Earthquake Recovery Project

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MAP

A. Basic Information			
Country:	Iran, Islamic Republic of	Project Name:	IR - Earthquake Emergency Response
Project ID:	P080802	L/C/TF Number(s):	IBRD-46970
ICR Date:	08/23/2010	ICR Type:	Core ICR
Lending Instrument:	ERL	Borrower:	ISLAMIC REPUBLIC OF IRAN
Original Total Commitment:	USD 180.0M	Disbursed Amount:	USD 174.9M
Revised Amount:	USD 174.9M		
Environmental Category: B			
Implementing Agencies: Project Management Unit (PMU) - EERP			
Cofinanciers and Other External Partners:			

B. Key Dates				
Process	Date	Process	Original Date	Revised / Actual Date(s)
Concept Review:	10/02/2002	Effectiveness:		02/23/2004
Appraisal:	10/17/2002	Restructuring(s):		
Approval:	06/03/2003	Mid-term Review:	04/30/2005	05/04/2005
		Closing:	06/30/2007	06/30/2009

C. Ratings Summary	
C.1 Performance Rating by ICR	
Outcomes:	Moderately Satisfactory
Risk to Development Outcome:	Moderate
Bank Performance:	Moderately Unsatisfactory
Borrower Performance:	Moderately Satisfactory

C.2 Detailed Ratings of Bank and Borrower Performance (by ICR)			
Bank	Ratings	Borrower	Ratings
Quality at Entry:	Moderately Satisfactory	Government:	Moderately Satisfactory
Quality of Supervision:	Moderately Unsatisfactory	Implementing Agency/Agencies:	Satisfactory
Overall Bank Performance:	Moderately Unsatisfactory	Overall Borrower Performance:	Moderately Satisfactory

C.3 Quality at Entry and Implementation Performance Indicators			
Implementation Performance	Indicators	QAG Assessments (if any)	Rating
Potential Problem Project at any time (Yes/No):	No	Quality at Entry (QEA):	Satisfactory
Problem Project at any time (Yes/No):	No	Quality of Supervision (QSA):	None
DO rating before Closing/Inactive status:	Satisfactory		

D. Sector and Theme Codes		
	Original	Actual
Sector Code (as % of total Bank financing)		
General agriculture, fishing and forestry sector	20	20
General education sector	10	10
General water, sanitation and flood protection sector	10	10
Housing construction	35	35
Roads and highways	25	25
Theme Code (as % of total Bank financing)		
Access to urban services and housing	33	33
Natural disaster management	33	33
Other urban development	17	17
Rural services and infrastructure	17	17

E. Bank Staff		
Positions	At ICR	At Approval
Vice President:	Shamshad Akhtar	Jean-Louis Sarbib
Country Director:	Hedi Larbi	Joseph P. Saba
Sector Manager:	Anna M. Bjerde	Hedi Larbi
Project Team Leader:	Christianna Johnnides Brotsis	A. Amir Al-Khafaji
ICR Team Leader:	Christianna Johnnides Brotsis	
ICR Primary Author:	Richard James	

F. Results Framework Analysis

Project Development Objectives (from Project Appraisal Document)

The project's main objectives are to assist the Government in:

(a) relieving social and economic hardships(DO1) caused by the April 2002 earthquake in Kermanshah, and the June 2002 earthquake in Qazvin, Zanjan and Hamedan through the reconstruction of damaged public and private assets in the Project Area; and

(b) developing an effective monitoring, mitigation and management system (DO2) designed to reduce the impact of future earthquakes.

Revised Project Development Objectives (as approved by original approving authority)

(a) PDO Indicator(s)

Indicator	Baseline Value	Original Target Values (from approval documents)	Formally Revised Target Values	Actual Value Achieved at Completion or Target Years
Indicator 1 :	Number of damaged housing units repaired and reconstructed in compliance with seismic standards			
Value quantitative or Qualitative)	0	24,200		24,000
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)	Financed materials for reconstruction of houses in compliance within stated criteria. i) housing units destroyed after 4-25-02 earthquake ii) households already secured loans from gov't iii) construction design & cost estimates completed iv) MPO approved			
Indicator 2 :	Number of damaged and destroyed infrastructure facilities that have been repaired or reconstructed in accordance with seismic standards acceptable to the Bank.			
Value quantitative or Qualitative)	0	287		222 contracts
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)	Project financed contracts to rehabilitate public infrastructure such as water and drainage networks, telephone, power, roads and electric systems			
Indicator 3 :	Number of sub-projects carried out under part A1			
Value quantitative or Qualitative)	0	6		5
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)	Three ICB packages for construction machinery and two IS packages of steel have been successfully procured that included steel, wheel loaders, double cabin vans and dump trucks.			
Indicator 4 :	Number of sub-projects carried out under part A2			
Value quantitative or Qualitative)	0	90 works and 3 goods		83 works and 3 goods

Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)				
Indicator 5 :	Number of sub-projects carried out under part A3			
Value quantitative or Qualitative)	0	161 works & 4 goods		157 works contracts & 4 goods contracts
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)				
Indicator 6 :	Number of sub-projects carried out under part B			
Value quantitative or Qualitative)	0	36 works & 2 goods		25 works contracts & 2 goods
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)				
Indicator 7 :	Launching of a public campaign on disaster preparedness including short films, booklets and educational sessions			
Value quantitative or Qualitative)	0	Model Public Campaign designed and launched		100%
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)				
Indicator 8 :	Carrying-out training on the enforcement of building codes for local government staff.			
Value quantitative or Qualitative)	0	200 key government staff to be trained across the 4 provinces		350 staff trained
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)	13 training sessions were carried out in the four affected provinces to train 350 local engineers			
Indicator 9 :	Completion of a report on Local Disaster Assessment & Implementation Strategy detailing past national and local emergency response experience in Iran			
Value quantitative or Qualitative)	0	1 report finalized		1 report finalized
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments				

(incl. % achievement)	
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(b) Intermediate Outcome Indicator(s)

Indicator	Baseline Value	Original Target Values (from approval documents)	Formally Revised Target Values	Actual Value Achieved at Completion or Target Years
Indicator 1 :	Combined construction work rate (subprojects under implementation) for Components A and B			
Value (quantitative or Qualitative)	0	75%		85%
Date achieved	06/24/2002	12/31/2008		06/30/2009
Comments (incl. % achievement)				
Indicator 2 :	Number of trainees who benefitted from the training program under the Capacity Building Component			
Value (quantitative or Qualitative)	0	150		300
Date achieved	08/28/2003	12/31/2008		06/30/2009
Comments (incl. % achievement)				
Indicator 3 :	Number of studies in progress under the Capacity Building Component			
Value (quantitative or Qualitative)	0	5		8
Date achieved	08/28/2003	12/31/2008		06/30/2009
Comments (incl. % achievement)				

G. Ratings of Project Performance in ISRs

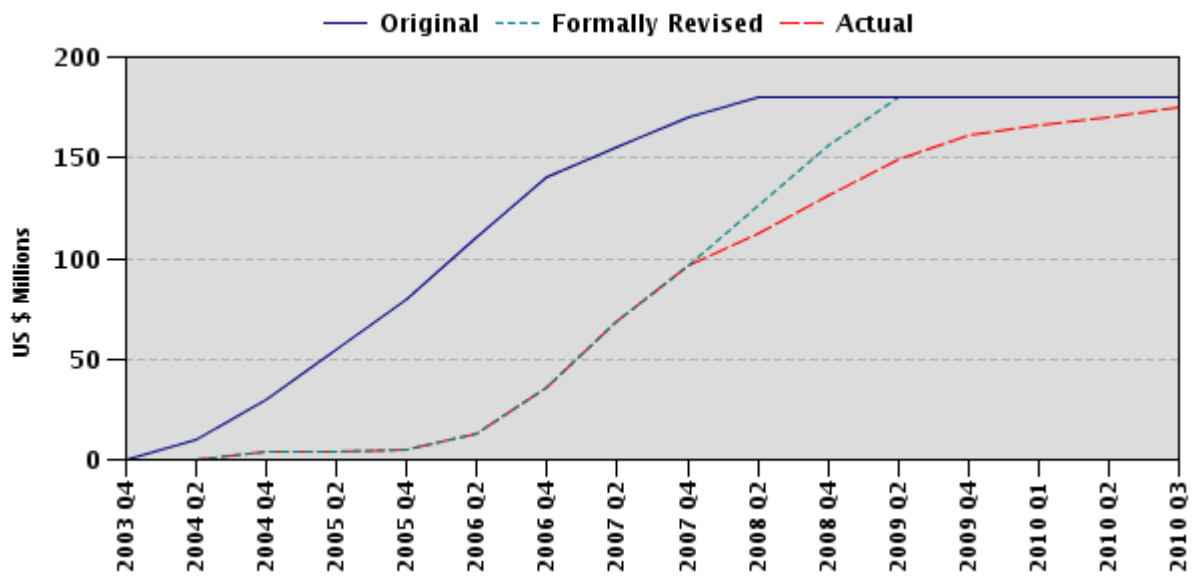
No.	Date ISR Archived	DO	IP	Actual Disbursements (USD millions)
1	07/08/2003	Satisfactory	Satisfactory	0.00
2	10/22/2003	Satisfactory	Satisfactory	0.00
3	04/30/2004	Satisfactory	Satisfactory	3.80
4	09/30/2004	Satisfactory	Satisfactory	4.24
5	12/27/2004	Satisfactory	Satisfactory	4.24
6	04/01/2005	Satisfactory	Satisfactory	4.24

7	11/29/2005	Satisfactory	Satisfactory	12.92
8	02/09/2006	Satisfactory	Satisfactory	20.04
9	04/17/2006	Satisfactory	Satisfactory	23.88
10	12/28/2006	Satisfactory	Satisfactory	68.94
11	06/27/2007	Satisfactory	Satisfactory	96.32
12	12/19/2007	Satisfactory	Satisfactory	109.11
13	06/24/2008	Satisfactory	Satisfactory	131.11
14	12/23/2008	Satisfactory	Satisfactory	148.83
15	06/30/2009	Satisfactory	Satisfactory	161.00

H. Restructuring (if any)

Not Applicable

I. Disbursement Profile



1. Project Context, Development Objectives and Design

1.1 Context at Appraisal

April 25th 2002 Earthquake: An earthquake measuring 4.8 on the Richter scale struck significant parts of Dinawar and small areas of Humeh counties of Sahneh Township in Kermanshah province on April 25, 2002 which resulted in one recorded death and some injuries. The damage to the property was estimated around US\$45 million.

June 22nd 2002 Earthquake: Another earthquake measuring 6.2 on the Richter scale struck three provinces of Qazvin, Zanjan, and Hamedan on June 22, 2002, resulting in 232 deaths, 1,466 injuries and more than 40,727 damaged houses. The Government of Iran (GOI) estimated the value of the damage to be around US\$257 million for the destroyed buildings, household properties, commercial equipment, damaged social and public infrastructure, agriculture production assets, and lost livestock. The above estimate did not take into account the losses in wages, production and sales, and actual cost of the relief effort and financial compensation. The data issued by the government suggested that the greatest impact of the earthquakes was on the region's housing and social infrastructure such as schools, health centers, hospitals and cultural/historical buildings. Most of the population affected by the disaster was low-income groups living in mud-brick houses with limited means and know-how to build earthquake-resistant structures.

In *Qazvin* province, around 3,000 commercial outlets, chicken farms, animal husbandry, small manufacturing units as well as a number of health and educational facilities were damaged as a result of the earthquake. Several public buildings including agricultural service centers, libraries, bathhouses, sports centers, places of worship, and public storage houses were also badly damaged. The earthquake also caused serious damage to historical sites and the power and water systems.

In *Hamadan* province, a total of 78 schools, 94 health centers and 88 bathhouses as well as a few places of worship and cultural centers were damaged. Heavy damages were also inflicted on the power, water and telecommunications system. Damage to the productive sector was heavy. A number of chicken farms, animal husbandry units, small-scale industries and handicraft workshops were completely damaged. A relatively large number of animal feed storage houses were also destroyed.

In *Zanjan* province, the telecommunication system, 29 educational facilities, 13 health centers and 15 hydrological systems were damaged. A large number of animal shelters and storage houses for animal feed were also severely completely destroyed.

In *Kermanshah* province, a total of 35 educational units were completely destroyed and another 43 partially damaged. Twenty health centers were also completely destroyed while 15 required repairs. The earthquake also damaged public infrastructure such as bridges, public buildings, and agriculture and animal husbandry units.

Response by the Government after the Earthquakes: The government formulated a two-stage strategy for responding to the two earthquakes. The first stage involved rescue and relief operations while the second involved rehabilitation and reconstruction efforts in the four affected provinces. The first stage was mobilized immediately after the first earthquake struck. The Ministry of Interior and the Islamic Red Crescent Society took the lead in relief operations and

provided stockpiles of tents and emergency supplies. All levels of the government were mobilized within few hours to deal with the disaster including emergency services in adjacent provinces focusing primarily on providing shelters to the inhabitants of the affected areas. Potable water and basic sanitation facilities were provided as were food supplies and clothing. Priorities under the second stage included restoration of basic social and public infrastructure such as schools and health centers, potable water, sanitation, electricity, and telecommunications and the provision of economic opportunities to the affected population.

Rationale for World Bank's Involvement: While financing of the reconstruction program relied primarily on the government's (GOI) own funds, which by that time had reached around US\$40 million, in parallel, the International Bank for Reconstruction and Development (the World Bank) was requested by the GOI to provide emergency assistance valued at US\$180 million and to apply its global post-disaster emergency reconstruction experience, and its strategic approaches to disaster risk management systems to Iran. To this effect, the World Bank on June 3, 2003, committed itself to financing the key elements of the government's emergency response strategy through the Earthquake Emergency Recovery Project (EERP). The Loan Agreement was signed between the GOI and the World Bank on August 28, 2003 and the loan became effective on February 23, 2004.

Link with Country Assistance Strategy: The project was developed as an emergency project upon government's request at which time Iran's April 2001 Interim Assistance Strategy (2001-2004, *Report No. 220050 IRN*) contained no reference to disaster mitigation.

1.2 Original Project Development Objectives (PDO) and Key Indicators

The original project development objectives¹ were to assist the GOI in: (i) relieving social and economic hardships caused by the earthquakes through the reconstruction of damaged public and private assets in the project area; and (ii) developing an effective monitoring, mitigation and management system designed to reduce the impact of future earthquakes.

The key performance indicators, for each component, as agreed during loan negotiation² were:

Component 1: Reconstruction of housing, social and public infrastructure: (i) number of damaged housing units that have been repaired or reconstructed in accordance with seismic standards; (ii) number of social and public sub-projects carried out in compliance with the selection criteria as set by the Management and Planning Organization (MPO); and (iii) number sub-projects repaired and reconstructed in compliance with the seismic standards.

Component 2: Economic recovery: (i) number of sector sub-projects carried out in compliance with the sector selection criteria as described in the MPO.

Component 3: Capacity building and project management: (i) completion and submission to the World Bank a report detailing past national and local emergency response experiences; and (ii) launching of a public campaign on disaster preparedness including the production of appropriate short-films and booklets, and the carrying out of educational sessions.

Component 4: Disaster insurance preparation: (i) formulation of a comprehensive proposal for the establishment of a local disaster insurance program; (ii) carrying-out of a program to train

¹ The project was expected to be implemented over three- year period.

² Schedule 7, Loan Agreement Document No. 4697-IRN, dated August 28, 2003.

local government staff on the enforcement of building codes; and (iii) the preparation of a draft legislation on natural disaster insurance and completion of a consultation process with the relevant stakeholders.

1.3 Revised PDO (as approved by original approving authority) and Key Indicators, and reasons/justification

The PDOs were not revised.

1.4 Main Beneficiaries

The main beneficiaries of the project were the people living in the affected areas of the four provinces i.e. Qazvin, Zanjan, Hamedan and Kermanshah. The project's direct beneficiaries included home owners whose properties were destroyed by the earthquake; road users; communities that were able to improve their disaster preparedness capacity; and the government staff in the four earthquake affected provinces. There were also several indirect beneficiaries such as skilled and un-skilled workers who acquired on-the job construction skills and the local builders who benefited through learning improved building standards and techniques. The provision of construction component also benefited small and medium consulting and construction firms that created local jobs.

1.5 Original Components (as approved)

The project development objectives were expected to be met through four components as described below:

Component A: reconstruction of housing, social and public infrastructure (estimated cost at appraisal: US\$137.52 million; actual cost US\$156.55 million³). The component constituted around 77% of the total project cost.

Sub-component A1: housing repair and reconstruction, and purchase of mechanical equipment (total amount disbursed US\$58.41 million). This sub-component financed the procurement of building material such as steel and cement, as well as mechanical construction equipment such as bulldozers, tractors, double dump trucks, loaders, backhoe shovels, etc.).

Sub-component A2: reconstruction of social infrastructure (total amount disbursed: US\$32.53million). This sub-component financed reconstruction of damaged social infrastructure such as schools, health clinics and local fire station.

Sub-component A3: public infrastructure (total amount disbursed: US\$65.61 million). This component financed reconstruction of public infrastructure such as water and drainage networks, telephone, power, road and electric systems.

Component B: Economic Recovery (estimated cost US\$26.90 million; actual amount disbursed: US\$13.02 million). This component financed investments in the earthquake-affected provinces that were expected to result in a strong base for local economic development, mainly focusing on

³ Actual amount financed/disbursed under the loan.

agricultural and infrastructure services selected on the basis of well defined eligibility criteria⁴. The component constituted around 15% of total project cost.

Component C: Capacity Building and Project Management (estimated cost US\$12.94 million; actual amount disbursed: US\$5.34 million). This component financed: (i) disaster management capacity building activities at local and national levels; and (ii) project management activities such as staffing, equipment and consulting services (feasibility studies, design works consultancies, assistance in developing tender documents, and construction supervision activities). The component constituted around 7% of the total project cost.

Component D: Disaster Insurance Preparation (estimated cost US\$2.64 million; actual amount disbursed is zero because the component was dropped from the World Bank financing at the request of GOI). This component was expected to finance initial feasibility work to establish system, a legal framework, and training Iranian service providers. The component constituted around 1% of the total project cost.

Project Costs: At appraisal, the total project cost, including contingencies, was estimated at US\$225 million of which US\$45 million was to be financed by the GOI. Details are as follows:

Component	Project Cost (US\$ million)	Bank Financed (US\$ million)
Component-A: Reconstruction of Housing, Social and Public Infrastructure	171.90	137.52
Component-B: Economic Recovery for Vulnerability Reduction	33.63	26.90
Component-C: Capacity Building & Project Management	16.17	12.94
Component-D: Disaster Insurance Preparation	3.30	2.64
Total Project Cost	225.00	180.00

1.6 Revised Components

The project components were not formally revised however the scope of work was slightly modified under component ‘A’ i.e.: (i) to offset the rising price of steel, the activity related to the procurement of cement (US\$5.97 million) was cancelled and the funds utilized to procure high priced steel; and (ii) due to emerging needs, the activity related to the procurement of ‘sand and gravel stations’ (US\$1.32 million) was cancelled and funds were utilized to procure additional dump trucks under the same category (goods). These modifications (in Component A) did not warrant any change in the PDO, results indicators, or the loan agreement.

In addition, there were changes requested by the government with regard to Component D and the reallocation of funds between categories. Component D was not formally cancelled but dropped from World Bank financing as the government undertook financing of the Disaster Insurance Preparation itself. The Component was quite small as a percentage of the project and did not affect the PDO.

Lastly, there was a government’s request to reallocate funds from Category 1A (civil works) to Category 2A (goods). While there was no formal reallocation made, an “over disbursement” was

⁴ (i) Studies acceptable to the Bank meeting sectoral standards; (ii) satisfactory completion of the environmental screening process; (iii) an identified source of counterpart funds to undertake operation and maintenance activities; and (iv) prior approval of Management and Planning Organization obtained.

⁵ Cement was supplied by the Housing Foundation from its own strategic stockpile.

authorized by the Task Team Leader at that time. This change also did not affect the achievement of the PDO.

1.7 Other Significant Changes

Cancellation of component: The Ministry of Economic Affairs and Finance requested the World Bank, in a letter dated May 14, 2005, cancellation of Component D (disaster insurance preparation) in the amount of US\$3.3 million and reallocation of proceeds to un-allocated category. During the Mid Term Review in July 2005, the Bank team concurred with this request and agreed to start the process of cancellation and reallocation. However this request was never followed through because of Bank's supervision team's oversight. The legal agreement was also never amended. The activity nevertheless remains government's top priority and is presently being implemented using funds from the Iranian Catastrophe Insurance Pool by the 'Central Insurance Company of Iran'.

Reallocation of funds between categories: The Ministry of Economic Affairs and Finance requested the World Bank, in a letter dated August 18, 2007, reallocation of funds between various categories including increase in Goods category from US\$55 million to US\$72 million. The Bank supervision team agreed with the proposal but overlooked following through the formal reallocation procedure. The Loan agreement was not amended. The disbursement on the reallocated amount was nevertheless done based on an 'over-draft' authorized by the Bank team which was to be followed by a formal project restructuring process but was overlooked.

Extension of effectiveness date: The two dated covenants (opening of the special account and the installation of financial management system) could not be complied with on time and therefore, the original project effectiveness date was extended from December 29, 2003 to March 31, 2004. The project became effective on February 23, 2004 once these conditions were met satisfactorily.

Extension of project closing date: The project closing date was changed twice to take advantage of the built momentum and to complete some unfinished activities. The first closing date was changed from the original June 30, 2007 to December 31, 2008 (18 months extension); while the second extension was provided from December 31, 2008 to June 30, 2009 (six months extension). The loan agreement was changed accordingly.

Change in the special account currency: The US financial sanctions on Iran in 2007, where funds denominated in US Dollars were unable to be transferred to the special account, necessitated the amendment of the loan agreement.⁶ The loan amendment provided the government flexibility to open and maintain special deposit accounts in Euros.

2. Key Factors Affecting Implementation and Outcomes

2.1 Project Preparation, Design and Quality at Entry

Quality at Entry was formally assessed through the QAE6⁷ process by the Quality Assurance Group (QAG). The panel rated the overall quality at entry as 'Satisfactory' and highlighted borrower's ownership as one of the strongest points of this operation. The panel also highlighted large number of agencies involved in this operation were well identified and the Ministry of Interior capable of leading a multi-agency group to coordinate work under this project.

⁶ June 15, 2007, Schedule 6, Section 2.02.

⁷ Sixth Quality at Entry Assessment, dated July, 2, 200.

Project Design: Soon after effectiveness, it became apparent that the scope and nature of the project was too diverse which made it difficult to supervise. The project included a broad range of sectors and activities such as telecommunications, water and sanitation, housing, health, education, power and roads, requiring a large number of implementing agencies both at the national and the provincial levels which utilized different approaches to implement their respective activities. The two main implementing entities, the Project Management Unit (PMU) and the Contract Management Unit (CMU) were forced to coordinate with 14 other provincial implementing agencies which covered a wide geographical area making it a total of 52 agencies with un-even capacities.

Use of ERL: The Government of Iran's request for the project was during a period of overwhelming need given that two major earthquakes occurred within a short period of time. However, the intervention could have been more effective had there been two separate stand alone interventions, first dealing with the emergency nature of the earthquakes (i.e. supplying cement and steel for reconstruction) while a follow-up dealing with the disaster preparedness aspects.

Project Conditionalities: The project had two dated covenants and one effectiveness condition (signing of the contract between the Housing Foundation (HF) and the Ministry of Interior (MoI)). As mentioned above, the effectiveness date had to be postponed because two of the three dated covenants were not complied with.

Project at Risk Status: The Bank's project preparation teams adequately highlighted main risks to the reconstruction activities both at the center (Tehran) as well as at the four provinces i.e. lack of capacity of the executing agencies, flow of counterpart funds, adequacy of Financial Management staff, and limited experience in implementing large geographical area reconstruction program. The project adequately put in place satisfactory mitigation measures to counter the risks.

2.2 Implementation

Factors causing implementation delays: Even though almost 100% of the funds were fully disbursed, there were nevertheless, several factors outside the control of the government that affected the smooth implementation of the project, for example: (i) The US financial sanctions on Iran led the special accounts, denominated in US Dollars, to be switched to Euros resulting in disbursement delays and loss of momentum; (ii) multiple UN sanctions which discouraged potential international bidders to bid in Iran limited the pool of competitive bidders causing further delays and increase in project costs (because of risk premium); (iii) quality and timeliness of many works contracts had to suffer because of heavy reliance on the local firms that were not familiar with the World Bank's bidding documents and guidelines further delaying implementation at the beginning of the project; and (iv) in connection with the UN sanctions, the World Bank put in place an additional level of screening under which goods and equipment specifications were reviewed against the list of prohibited items and entities identified in the UN Resolutions, causing some additional delays when the new process was introduced;

Establishment of the Contract Management Unit (CMU): A new unit was established under the project to implement component A (reconstruction of housing, social and public infrastructure) and component B (economic recovery for vulnerability reduction). With the support of the procurement consultants and advisors, familiar with the World Bank's procurement guidelines,

⁸ Four provinces of Qazvin, Zanjan, Hamedan and Kermanshah.

the CMU played a central role in the procurement of goods and services and in preparing bidding documents in line with the World Bank guidelines.

Project Management Unit (PMU): Under the Ministry of Interior, the PMU was established and made responsible to carry out day-to-day project activities and also serving as the focal point for all the provincial implementing agencies. With adequate staffing in place, the PMU was responsible to implement component C (capacity building technical studies and training) and component D (disaster insurance preparation) and reported to the National Committee for Reduction of Natural Disasters' Impact (NCRNDI) which was specifically established to serve as a project steering committee and to oversee supervision and coordination of disaster management and post disaster activities in the country.

Country Portfolio Performance Review (CPPR): The CPPR was carried out May 7th through May 9th, 2005¹⁰ during which the following issues were highlighted and specific time-bound actions agreed upon: (i) to attract larger pool of steel suppliers, the bidding documents were to be revised allowing insertion of price adjustments formula and revising the bidders' post-qualification criteria; (ii) to mitigate future delays, project simplification measures were to be adopted, in particular, cancelling the non-performing or potentially time-consuming packages from the procurement plan and instructing provinces to avoid submitting complex sub-projects; and (iii) payment procedures were to be decentralized by opening provincial sub-accounts to facilitate contractors' payments.

Mid Term Review: Building upon the initial overall assessment carried out during the CPPR, the MTR was carried out jointly with the PMU and the CMU during May 4th to May 17th 2005 and then July 9th to July 12th, 2005. The main objectives of the MTR were to assess the project's original development objectives against the implementation status to date and examine factors that could be affecting achievement of the project's overall goals. The key agreements reached during the MTR were: (i) cancellation of the slow moving component D (disaster insurance scheme) thus reducing the number of counterpart agencies and allowing more focus on other priority activities; and (ii) simplification of implementation processes by re-packaging sub-projects of similar nature under each component, for each province, as a result the total number of sub-projects for the second year of implementation was reduced drastically from the original 187 to a consolidated 64.

2.3 Monitoring and Evaluation (M&E) Design, Implementation and Utilization

The PMU was unable to establish an adequate M&E system to measure performance of the diverse set of sub-projects during its entire life. Although the World Bank's supervision teams as well as its management highlighted the need of defining a simple M&E system but this was never followed through. At project closing the beneficiary assessment was carried out, although the data presented in the assessment could not be independently verified due to travel restrictions following the civil unrest in June 2009. The World Bank's supervision teams also occasionally carried out informal assessments on an ad-hoc basis but limited the assessment to project outputs, rather than actual outcomes, and only presented data through anecdotal evidence. After repeated requests from the World Bank, the PMU committed itself to recruiting an M&E

⁹ NCRNDI was chaired by the MoI and its membership included the Ministry of Economic Affairs and Finance; Management and Planning Organization; Iranian Red Crescent Society; most sectoral ministries (roads, telecom., water, roads, health, education); and a number of research institutes.

¹⁰ In Kish Island.

¹¹ Archived Implementation Status Report #7, dated Nov. 29, 2005.

specialist but the specialist was never engaged. At the time of project closing, it was not known clearly how much of Bank's support towards cement and steel actually reached the intended beneficiaries.

2.4 Safeguard and Fiduciary Compliance

Environmental Safeguard:

Most of the sub-projects were of category 'C' nature with the exception of safe water and sanitation facilities and some road rehabilitation sub-projects that fell under category 'B' requiring preparation of the Environmental Management Plan under OP 04.01. However, being an emergency operation, processed under OP08.50, no formal environmental assessment (EA) or consultations were undertaken. Only a limited EA was carried out for the sub-projects that had potential for adverse impact. The Social and Environmental Screening and Assessment Framework (SESAP), including mitigation and monitoring plan, were adequately drafted and discussed during project negotiations. The SESAP was compiled in the Technical Annex and made publicly available in the country (translated into Farsi), and delivered officially to the World Bank prior to the Board presentation. During implementation, all the sub-projects were screened to ensure that environmental risks were adequately addressed through the application of standardized guidelines provided in the SESAP.

Social Safeguards:

Given the comprehensive nature of the emergency reconstruction program, the project documents highlighted the possibility of triggering two safeguard policies i.e.: Cultural Property (OPN. 11.03); and Involuntary Resettlement (OP/BP 4.12), neither of which got triggered. A senior social specialist in the PMU as well as from the World Bank regularly monitored all safeguard aspects of the projects.

Cultural Property (OPN. 11.03): The project financed works related to some historic buildings sites and exercised extreme caution not to disturb any cultural sites. The SESAP clearly included guidelines for civil works contracts to guide contractors in the event they came upon culturally significant items during the reconstruction.

Involuntary Resettlement (OP/BP 4.12): The project did not directly engage in the physical reconstruction efforts but financed the provision of equipment and construction material for the reconstruction of housing, social and public infrastructure, and therefore, OP/BP 4.12 did not get triggered.

Indigenous People (OP 4.20): This clause did not apply because the persons affected by the project were neither vulnerable ethnic minority nor scheduled as tribal people within the provision of Iranian law.

Financial Management and Disbursement:

The Financial Management (FM) was carried out in accordance with the project's design and the loan agreement. Overall the FM arrangements were considered adequately capable of generating the required quarterly Financial Management Reports (FMRs). The accounting unit, within the PMU, continued to be staffed with a financial officer and an accountant who reconciled project special account (SA) on a monthly basis and generated quarterly progress reports. These reports were regularly verified and approved by the World Bank's FMS. There was also clear

segregation of duties between the functions of initiation, authorization, disbursement, and recording financial transactions. The SA was reconciled periodically and the Withdrawal Applications were issued in a timely manner.

Even though the FM system was considered satisfactory, the project nevertheless faced some initial difficulties when the US financial sanctions were imposed on Iran. For example, the GOI's directive prohibiting the deposit of US Dollars into the SA, and of switching the project currency from US Dollar to Euros, resulted in conversion difficulties causing delays in producing timely FM reports. The implementing agencies' limited capacity in inventory management systems also impeded the project progress. Despite this, the accounting unit, with the assistance from the World Bank's FMS, successfully addressed these issues and kept the accounting system running smoothly. The World Bank's FM Specialists participated in all the supervision missions after the project became effective.

Audit Arrangements: The project's audit arrangements remained satisfactory. Formal audits of the project were carried out on an annual basis in accordance with the International Standards on Auditing. The results repeatedly confirmed the adequacy of accounting system and the internal controls and the reliability of the statements of expenditure as the basis of loan disbursements and compliance with the legal covenants. The audit report at project closing includes US\$1 million which could not be reconciled from the project accounts. As of writing this ICR report, this issue is still pending.

Procurement:

To handle procurement activities, the Ministry of Interior had contracted the Housing Foundation to establish a Contract Management Unit (CMU) that was responsible for contract management activities related to the procurement of works, goods and service contracts according to the World Bank guideline. The CMU assisted the PMU in the preparation of bidding documents for civil works, goods and selection of engineering consultant services, as well as verifying the progress of contractors' work and certifying needed payments. The PMU remained the responsible entity for exercising the overall control of procurement, signing contracts and executing payments.

The location of the PMU, CMU, and the Financial Controller's office being in three different places was a major problem from the very beginning. The PMU and the CMU were located in different offices in different parts of the city which limited their contacts to telephones and irregular meetings preventing the two entities from functioning as one team. While the CMU handled the procurement issues of civil works and goods in a satisfactory manner, the PMU was left to handle its own selection of consultants for components C and D. The high turnover of specialized staff in the PMU and lack of procurement capacity prevented them from having a satisfactory performance in this regards.

Another issue that added to the problems was not having a Financial Controller totally dedicated to the project. The Financial Controller was located in the Ministry of Interior, at a different location from the PMU which added to the communication problems. Half way through the project implementation, the PMU *Financial Officer's* office was moved from the location of PMU, to the office of *Financial Controller*. Even though this had the benefit of the Financial Officer being closer to the Financial Controller, the close contact with the rest of the PMU staff, and the Procurement Team at CMU, was always amiss.

Managing several small packages scattered all over towns and villages of the four provinces was problematic, however, to this end the project team should be commended for successfully procuring 280 Works packages scattered in the three provinces.

Problems with Procurement of Goods: The process of Letter of Credit opening proved to be a cumbersome process in the context of the banking sector in Iran which became even more difficult as a result of some banks stopping to work with their local counterparts, as the result of various sanctions. However, the problems were resolved eventually with extra efforts made by CMU and PMU, when eventually most of the items were successfully procured. The only item not procured as the result of the technical specifications matching the prohibited list under the UN sanctions was the ‘*shaking table*’ estimated at US\$ 2.1 million. Generally speaking the procurement performance may be rated as *Moderately Satisfactory* with CMU’s performance being *Satisfactory* while the PMU’s performance being *Moderately Satisfactory*.

2.5 Post-completion Operation/Next Phase

All the activities envisaged under the project were carried out successfully, with the exception of those that got cancelled at the government’s request (component D - disaster insurance preparation). Essentially the cancelled activities comprised of only four studies, constituting around 1.4% of the total project cost (US\$2.64) i.e.: (i) risk management and flood exposures study; (ii) comparative analysis of international disaster insurance models and the development of an appropriate natural disasters insurance model for Iran; (iii) preparation of operational guidelines, rating guidelines and policy terms and conditions; and (iv) building surveys/geographic information system and data bases. At project closing, the *Bimeh Markazi Iran* (the Central Insurance of Iran) had agreed to carry-out these unfinished studies using government’s own funds.

3. Assessment of Outcomes

Overall Rating: *Moderately Satisfactory*

3.1 Relevance of Objectives, Design and Implementation

With two major seismic belts, Iran is known to be among the most earthquake prone countries in the world. Because of its high exposure to natural calamities, the country pays serious attention to emergency response and disaster management and has considerably improved its preparedness under the overall responsibility of the Ministry of Interior. Therefore, the project components are relevant to the project’s main objective of relieving social and economic hardship of the communities affected by the earthquake. The main objective is also squarely aligned with the government’s own priorities of providing permanent shelters to the inhabitants with severely damaged houses throughout the country.

Link with Country Assistance Strategy: The project was developed as an emergency project upon government’s request at which time Iran’s April 2001 Interim Assistance Strategy (2001-2004, Report No. 220050 IRN) contained little reference to disaster mitigation.

Implementation Completion Report (ICR): Since there had been no supervision mission since May 2008 and no ICR mission was authorized due to travel restrictions put in place following the June 2009 civil unrest, the ICR team had to rely on Bank documentation with little or no input from the Borrower (the PMU team had largely disbanded). This situation has resulted in the need to reconstruct events related to changes in the project using available documentation and in

consultation with project team members and CMU staff. As a result, there have been limited opportunities for clarification and input from the Borrower's side and possibly less accuracy in the ICR than desired.

3.2 Achievement of Project Development Objectives

The achievement of the PDO is rated *moderately satisfactory* as the project successfully contributed towards relieving social and economic hardships of the people affected by the 2002 earthquakes. This was confirmed during the recent survey¹² in which the beneficiaries expressed satisfaction with the reconstruction efforts and the improved social and public services received. The project was successful in rebuilding damaged public and private assets and designing effective monitoring, mitigation and management system which is expected to reduce the impact of future earthquakes. Following are the activities that contributed to the achievement of the PDOs under each component:

Component A: Reconstruction of housing, social and public infrastructure: This component provided mechanical equipment¹³, steel and cement to the affected provinces to help reconstruct 24,200 damaged housing units,¹⁴ city hospitals, local schools, emergency medical centers, drinking water networks and a fire station building under *social infrastructure* sub-component. Under the *public infrastructure* sub-component, the component financed restoring the telecommunication services by installing telecommunication networks and procurement fiber optic cables and switches. The component helped reconstruct both, the on-going and the new sewerage treatment plants and restored the power supply to the affected areas by constructing distribution transmission networks. Under the road sector, the component financed asphaltting and strengthening of key roads and bridges that were severely damaged by the frequent movement of heavy relief and rescue machinery. Another main achievement of this component was the repair of around 64 km of roads in Zanjan province. All the new construction under this component was in compliance with the seismic standards which significantly improved access to, and quality of, public and social services. The overall development objective achieved under this component is rated as *Satisfactory*.

Component B: Economy recovery for vulnerability reduction: To support economic recovery in the affected provinces, this component focused on the agricultural services and infrastructure and helped replace damaged economic assets thereby strengthening the bases for the local economic development. This component financed a diverse group of subprojects ranging from the rural irrigation networks to livestock production, to cold storage facilities. It is worth highlighting here that the agricultural initiatives undertaken in the Qazvin province, for example, had a very positive impact on rural households, according to the latest beneficiary survey, as these sub-projects were concentrated in areas which usually did not attract major public funding due to their small population size and remoteness. The overall development objective achieved under this component is rated as *Satisfactory*.

Component C: Capacity building (A) Disaster Management and (B) Project Management: (A) regarding disaster management capacity building, various initiatives were financed, for example, a model public awareness program¹⁵ was designed and launched which has significantly enhanced the national and local level awareness of preventive measures minimizing the risks

¹² Prepared in March 2010, by Dr, Pooya Alaedini.

¹³ Wheel loaders, double cabin vans and dump trucks.

¹⁴ Against appraisal estimate of 29,232.

¹⁵ Which included production of short-films, booklets and educational sessions for the public.

from future natural disasters. This fact was confirmed during the beneficiary assessment surveys conducted in March 2010; around 200 key government staff (mostly engineers) were trained across four provinces on the enforcement of seismic building codes; a report was completed that dealt with the local disaster assessment mechanism and implementation strategy on emergency response situations; pilot studies were carried out to analyze and test the earthquake resistant construction technologies; and finally, a policy was formulated¹⁶ on the necessary institutional government interventions which is expected to reduce catastrophic losses from any future natural disasters. This sub-component also contributed to the passage of a national law that institutionalized the National Disaster Management Taskforce in the country.

(b) Regarding the capacity building activities for the project management sub-component, staffing and equipment was provided to the PMU; implementation fee was financed for the Housing Foundation to manage components A and B; consulting services were financed that helped prepare the feasibility studies, tender documents and the supervision of construction activities; and finally project's annual external audit were financed under this sub-component. The overall development objective achieved under this component is rated as *Satisfactory*.

Component D: Disaster Insurance Preparedness: This component (constituting only 1.4% of the total project cost, around US\$2.64 million) was dropped from the World Bank financing at the government's request. The activities, essentially four studies, are presently underway using funds from the Iranian Catastrophe Insurance Pool and are being implemented by the 'Central Insurance Company of Iran'. The overall development objective achieved under this component is rated as *Unsatisfactory*.

3.3 Efficiency

As an emergency operation (processed under OP08.50), economic and financial analysis was not required and therefore not done at Appraisal.

3.4 Justification of Overall Outcome Rating

Rating: Moderately Satisfactory

The overall project outcome is considered *moderately satisfactory* on the basis of high relevance of the project, the level of achievement of the PDOs, and the general satisfaction of the public as revealed during the beneficiary surveys and stakeholder workshops conducted during March 2010. The effectiveness of outcome was also satisfactory as around 24,200 housing units reconstructed were in full compliance with the seismic standards; a well received public campaign on disaster preparedness was launched successfully; and the government staff, engineers, masons, and the local builders were trained on seismic building codes that are now fully enforced in the affected provinces. The Disaster Insurance Preparedness activities under component D (constituting 1% of the total project cost - essentially four studies) were cancelled hence the overall outcome is considered moderately satisfactory.

3.5 Overarching Themes, Other Outcomes and Impacts

(a) Poverty Impacts, Gender Aspects, and Social Development

¹⁶ With the help of a team of international experts.

The project was not a poverty targeted intervention even though most of the people affected were of low-income groups who lived in the mud-brick houses with limited means and know-how to build earthquake-resistant structures, according to the damage assessment report¹⁷ prepared by the government during project appraisal. The World Bank's mobilization of assistance allowed these poor households to resume their livelihoods and protect them from falling further into poverty. The beneficiary assessment report, of March 2010, specifically prepared by a local consultant for the purposes of this ICR, highlighted that the reconstruction process was carried out to the satisfaction of the vast majority of households and which resulted in assisting the general population with improved access to housing, drinking water, transport services, educational facilities, emergency response facilities, and the health services at a higher quality standards.

(b) Institutional Change/Strengthening

The project's institutional development impact is rated *satisfactory* as evidenced by the establishment of the PMU and the CMU that are now capable of dealing with complex procurement issues according to the World Bank guidelines. The project financed around US\$5.34 million to strengthen various government departments and introduced new construction techniques and seismic building codes for the local engineers. The technicians are now fully capable of evaluating risks and vulnerability of buildings and testing adequacy of earthquake resistant construction. The government departments are also well prepared because of training received on earthquake preparedness and mitigation. With the capacity building training, the PMU and the CMU are now capable of managing and monitoring implementation progress of any future project.

(c) Other Unintended Outcomes and Impacts (positive or negative)

Based on the beneficiary survey carried out at project closure, an unintended benefit that stood out was the employment opportunities the project was able to generate while being implemented in the four affected provinces. The data however cannot be independently verified by the ICR author because of travel restrictions.

3.6 Summary of Findings of Beneficiary Survey and/or Stakeholder Workshops

A beneficiary survey was conducted¹⁸ in February and March of 2010, aiming at identifying extent to which the citizens of the four affected provinces benefitted from the reconstruction efforts and their level of satisfaction. The survey looked for visible signs of economic recovery because of project's intervention, and the extent to which the disaster management capacity was improved both at the national as well as the local level.

According to the survey, the direct beneficiaries interviewed agreed that overall, the project had a very positive impact on their lives and/or their activities as it successfully provided housing, drinking water, transport services, educational facilities, emergency response facilities, and health services for the local communities at higher quality standards. The beneficiary satisfaction was noted as highest for activities that were implemented by the line agencies with relatively better capacities.

¹⁷ The report was prepared by the government with information collected from the Governor-General Offices of Zanjan, Qazvin, Hamaden, and Kermanshah provinces as well as the MOI; July 2002.

¹⁸ By a local consultant, Dr. Pooya Alaedini.

Disaster preparedness intervention was noticeably improved which manifested into higher institutional capacity, safer housing, schools, hospitals, emergency response centers, and having available critical equipment for disaster relief centers. The survey highlighted enhanced agricultural activities and related services in some rural areas, in addition to the improved capacity to implement projects at higher quality standards vis-à-vis management capacity, engineering, construction standards, and/or supervision. The line agencies were also sensitized to the social and environmental safeguards standards followed by the World Bank. The detailed findings of the beneficiary survey are presented in Annex 5.

4. Assessment of Risk to Development Outcome

Rating: Moderate

The possibility that changes may occur which may be detrimental to the ultimate achievement of project's outcome is considered *Moderate*. At present there is sufficient political commitment by the government and the Housing Foundation in scaling up successful endeavors. The government has fully bought into the idea of continuing with additional infrastructure rehabilitation and expanding new service delivery system into other areas which were not covered under the project. The Housing Foundation has shown great interest in continuing this trend and has signaled its willingness to request for more funds to facilitate Disaster Insurance Preparation activities for which the government is presently negotiating with other lenders to secure financing.

5. Assessment of Bank and Borrower Performance

5.1 Bank Performance

(a) Bank Performance in Ensuring Quality at Entry

Rating: *Moderately Satisfactory*

The Bank moved quickly to carry out the damage/need assessment exercise providing sound grounds to prepare the project. The Bank's preparation missions were adequately staffed with needed specialists to support design of the project. The Project was prepared in a collaborative manner with the government's Task Force including all the line ministries, special agencies and the representatives of the four affected provincial governments. The draft project operational manual was also prepared during project design phase. However, as mentioned earlier, the Quality at Entry was not reviewed through the QAE process by the Quality Assurance Group neither was an Ad-hoc committee established, as is customary for emergency projects of this size and scope. The project was considered overly complex as it consisted of more than 400 sub-projects across several sectors with over fifty implementing line agencies covering a wide geographical area. The PMU was consequently forced to rely on sub-project designs and justifications that were provided by different line agencies with uneven capacities.

The Bank's project preparation team was unable to establish an adequate monitoring and evaluation system which could manage diverse set of sub-projects. The Technical Annex, it seems, was prepared in haste as project objectives were not mentioned anywhere in the document (mentioned only in the loan agreement). The project also had one effectiveness condition and

¹⁹ *Signing of contract between the Housing Foundation and the Ministry of Interior.*

three dated covenants.²⁰ The effectiveness date had to be postponed because two of the three dated covenants were not complied with in a timely manner.

(b) Quality of Supervision

Rating: *Moderately Unsatisfactory*

The quality of Bank supervision is rated as *moderately unsatisfactory*. The supervision teams worked extensively with the four Governorates during the first two years of implementation to build a solid pipeline of sub-projects, continued their hands-on approach and remained close to the clients even during challenging country environment. Additionally, regular supervision missions were maintained with a continuous dialogue with the clients despite the changing leadership within the ministries and the governorates²¹. This partnership was essential in maintaining effective coordination with other partners (donors, NGOs) who looked for Bank's advice and direction.

During later years and after several TTL transitions, the quality of project supervision was uneven. For example, the Bank received an official request from the government, dated May 14, 2005, to cancel Component D. This request was never followed through and the component was not formally cancelled because of an oversight by the Bank. The funds were not formally reallocated nor the loan agreement amended. As a general practice, in the absence of loan agreement amendment, a 'Re-allocation Notice' is transmitted to the government but this too was overlooked.

Similarly, no action was taken after the Bank received a second request from the government, dated August 18, 2007 to reallocate funds among different categories, including increase in Goods category from US\$55 million to US\$72 million. The Bank team did not follow regular Bank procedures but allowed reallocation by way of authorizing an 'over draft' and informed the management that this would be followed through by a formal project restructuring during the follow up mission. This was not carried out as planned.

Finally, during the MNA PAD review of discrepancies between PAD/Technical Annexes and Legal Agreements, the task team reported to management that all inconsistencies were corrected, Legal Agreement amended and no further action required. Upon reviewing the documents it was found that the Legal Agreement was not amended.

Procurement: The HF and the PMU were trained to follow the World Bank's procurement rules for National Shopping, however such rules proved to be somewhat over-demanding in the local context, where suppliers of building materials and qualified contractors were not always readily available in large numbers and in proximity of the affected villages. Also the characteristics of the local markets were such that the suppliers were not willing and not used to providing quotations valid for 30 days because of large price fluctuations in the market. The suppliers could only provide quotations valid for one day and blocked it if funds were not provided in advance. Considering these ground realities, it may have been more effective if the World Bank teams had invested greater amount of time and energy to hand hold communities and provided due diligence guidance on real time basis to prevent time and cost over-runs. However, with the

²⁰ (i) Recruitment of two financial management (fm) specialists; (ii) installation of fm systems/accounting software; and (iii) opening of special account.

²¹ The Minister of Interior and the Governors of Qazvin and Zanjan were changed while the Managing Director of HF was changed once during the course of project implementation.

sheer vastness of the program (across four provinces) and the logistical constraints, this may be seen only in the hindsight and may be a lesson to be kept in mind while preparing future projects with such programs involving communities with limited capacities and support from the governments.

Financial Management: The Financial Management supervision remained somewhat challenging at the village levels. The World Bank accredited financial management specialists were part of every single supervision mission and had hands-on approach to resolving issues. During supervision missions, the FM team conducted intensive field visits and reviewed FM arrangements, identified issues and discussed, with the PMU, the mitigation measures. Only occasionally did the project observed delays in receiving financial monitoring reports.

(c) Justification of Rating for Overall Bank Performance

Rating: *Moderately Unsatisfactory*

The overall rating of Bank's performance is rated as *Moderately Unsatisfactory* – being moderately satisfactory at entry and *Moderately Unsatisfactory* during supervision. It is worth noting, that the World Bank's support throughout the project's life was widely acknowledged by stake holders as having made significant contributions to achieving the project's main development objective of relieving social and economic hardships caused by the earthquakes which ultimately helped restore the living conditions of the affected population.

5.2 Borrower Performance

(a) Government Performance

Rating: *Moderately Satisfactory*

The Government's performance is rated as *moderately satisfactory*. During project design, the Housing Foundation and the government's inter-ministerial committee members (National Committee for the Reduction of Impact of Natural Disasters, in particular) worked closely with the Bank's preparation team and provided the necessary support in designing and setting up project priorities. Because of good dialogue maintained, the project always enjoyed the support from government which reiterated their top priorities matching perfectly those with the development objectives of the project and reaffirmed support in carrying out project activities in the four provinces. The government however was too slow in meeting the dated covenants which delayed progress effectiveness by three months.

(b) Implementing Agency or Agencies Performance

Rating: *Satisfactory*

The performance of the Contract Management Unit (CMU) and the Project Management Unit is considered *satisfactory*. Both units proactively took positive actions to terminate contracts with the non-performing contractors and transferring implementation responsibility for the completion of such works to the provincial implementing agencies. The PMU also streamlined administrative procedures (within the Ministry of Interior) to process invoices to speed up payments which ultimately helped achieve the overall disbursement of US\$175 million (97% of the total project

amount). When faced with key bottlenecks in the procurement process²² both the units committed to a series of actions to mitigate shortcomings by following up with local agencies and exploring with the Financial Controller to apply to the contracts, the directive of a letter by MOP which allowed the use of a “provisory note” to replaced the commercial bank guarantee to release advance payments for small works. To effectively facilitate project coordination effort, the PMU also appointed full time capacity building officer and a liaison officer in the National Disaster Task Force, positions that were not envisaged earlier.

(c) Justification of Rating for Overall Borrower Performance

Rating: *Moderately Satisfactory*

Overall the Borrower’s performance takes into consideration both the government and the two implementing agencies’ performance during project preparation as well as implementation. On the basis provided above, the Borrower’s overall performance is rated as *Moderately Satisfactory*. At the time of project closing, the Borrower had complied with all the covenants and agreements towards achieving development outcomes.

6. Lessons Learned

- A key recommendation for future project design is to avoid subsuming a broad range of objectives and sectors under the umbrella of a single emergency project. It is more effective to focus projects on specific sectors and activities that are directly related to the immediate reconstruction efforts.
- ERL may not be the most appropriate lending instrument for “softer” or longer term interventions such as disaster preparedness and prevention since ERLs are typically designed for a three year project implementation period.
- Economic recovery initiatives are best formulated under a separate project with clear and measurable employment, income, and empowerment outcome/impact indicators.
- Incompatibilities must be resolved up front in dealing with bidding and contract regulation mechanisms in countries where they are different from those of the World Bank.
- Emergency reconstruction projects of this nature should have a monitoring and evaluation system in place upfront with mechanism to track core performance indicators.
- Community participation in identifying sub-projects is essential. Many of the EERP subprojects were identified and implemented with very limited consideration given to this aspect, for example, in some cases subprojects were contrary to local priorities bringing public dissatisfaction, conflicts and delay.
- Emergency project should avoid having (effectiveness) conditionalities.

7. Comments on Issues Raised by Borrower/Implementing Agencies/Partners

²² Such as lengthy timeframe for submission of technical specifications by local agencies or difficulty for small contractors to obtain bank guarantees etc.

(a) Borrower/implementing agencies
N/A

(b) Co-financiers
N/A

(c) Other partners and stakeholders
N/A

Annex 1 Project Costs and Financing

(a) Project Cost by Component including contingencies (in USD Million equivalent)

Components	Appraisal Estimate	Actual Cost	Percentage of Appraisal
Reconstruction of Housing, Social & Public infrastructure	137.52	156.55	113.84
Economic Recovery	26.90	13.02	48.40
Capacity Building & Project Management	12.94	5.34	41.27
Disaster Insurance Preparation	2.64	0.00	0.00
Total Project Costs	180.00	174.91	-

(b) Financing

Source of Funds	Appraisal Estimate	Actual Cost	Percentage of Appraisal
Government of Iran	45.00	41.00	91.11
The World Bank	180.00	174.91	97.17

Annex 2. Outputs by Component

Component A: Reconstruction of Housing, Social and Public Infrastructure

Goods & Equipments Procured:

- 50, 955 Metric Tons of Steel for HF
- 61 Wheel Loaders for the HF
- 36 Double Cabin Vans for the HF
- 3 Double Cabin Vans for Qazvin province
- 7 Double Cabin Vans for the Rural Water & Sewage Company of Qazvin province
- 280 Dump Trucks for the HF
- Medical Equip. for Medical Science Universities of Qazvin & Hamedan provinces
- Truck Chassis/Water Tanker for Rural Water & Sewage Co. of Qazvin province
- Various Laboratory Equipments for Rural Water and Sewage Company of Qazvin
- Ambulances for University of Medical Sciences of Qazvin & Zanjan provinces

Component B: Economy Recovery for Vulnerability Reduction

Goods & Equipments Procured:

- Radio Network for Natural Resources Institute of Qazvin province
- Fire Extinguishing Equipments for Natural Resources Institute of Qazvin province
- High Pressure Irrigation Equipment for Agricultural Jihad of Zanjin province

Component C: Capacity Building for Disaster Management & Project Management

Equipments Procured:

- Mobile Radio Systems
- Life Detector Compact Systems
- Geophysical Equipments for Tehran University
- Geophysical Equipments for National Disaster Reduction Institute
- Shaking Table Systems for Amirkabir University

Studies/Workshops Conducted:

- Public Awareness Seminars conducted to minimize risks from future disasters
- Training provided to 200 engineers on enforcement of building codes
- Report completed on local disaster assessment and emergency response strategy
- Pilot studies completed to test earthquake resistant construction technologies
- Policy framework prepared on government interventions to reduce catastrophic losses from natural disasters

Component D: Disaster Insurance Preparedness

Component cancelled at government's request

Annex 3. Economic and Financial Analysis

Not carried out due to Emergency Nature of the Project (project exempted)

Annex 4. Bank Lending and Implementation Support/Supervision Processes

Supervision Mission October 22, 2003:

Bank Mission Members: Al-Khafaji (Lead Operations Officer/TTL, MNSIF); Kato (Urban Management Specialist, MNSIF); Motabar (Sr. FM Specialist, MNACS); Rosanna Nitti (Urban and Disaster Management Specialist, MNSIF); Tahoub (Sr. Procurement Specialist, MNACS); Dajani (Operations Officer, MNSIF).

Supervision Mission April, 2004:

Bank Mission Members: Al-Khafaji (Lead Operations Officer/TTL, MNSIF); Kato (Urban Management Specialist, MNSIF); Rosanna Nitti (Urban and Disaster Management Specialist, MNSIF); Tahoub (Sr. Procurement Specialist, MNACS); Dajani (Operations Officer, MNSIF); Gurenko (Disaster Insurance, OPD).

Supervision Mission September 30, 2004:

Bank Mission Members: Robert Maurer (Lead Urban Specialist/TTL, SASIE); Kato (Urban Management Specialist, MNSIF); Tahoub (Sr. Procurement Specialist, MNACS); Dajani (Operations Officer, MNSIF); Pirouz (Mechanical Engineer, consultant, MNSIF).

Supervision Mission December 27, 2004:

Bank Mission Members: Robert Maurer (Lead Urban Specialist/TTL, SASIE); Nitti (Urban and Disaster Management Specialist, MNSIF); Pirouz (Mechanical Engineer, consultant, MNSIF); Robert Bou Jaoude (Financial Management Specialist, MNACS); Cittati (Sr. Procurement Specialist, MNSIF); Hedi Larbi (Sector Manager, MNSIF).

Supervision Mission April 1, 2005:

Robert Maurer (Lead Urban Specialist/TTL); Helen Z. Shahriari (Sr. Social Scientist); Tahoub (Sr. Procurement Specialist, MNACS); Christianna Johnnides (Urban Specialist); Nitti (Urban and Disaster Management Specialist, MNSIF); Elena Gagieva-Petrova (Program Assistance); and Hany Shalaby (ET Consultant, Cairo);

Supervision Mission November 29, 2005:

Robert Maurer (Lead Urban Specialist/TTL); Helen Z. Shahriari (Sr. Social Scientist); Thao Le Nguyen (Sr. Finance Officer); Hany Shalaby (ET Consultant, Cairo); Robert Bou Jaoude (Financial Management Specialist, MNACS); Dahlia Lotayef (Sr. Environment Specialist); Alessandro Palmieri (Lead Dam Specialist)

Supervision Mission February 9, 2006:

Robert Maurer (Lead Urban Specialist/TTL); Helen Z. Shahriari (Sr. Social Scientist); Antonio J. Cittati (Consultant); Balakrishna Menon (Sr. Urban Specialist); Rosanna Nitti (Sr. Urban Specialist); Ali Reza Abedini (Consultant)

Supervision Mission April 17, 2006:

Robert Maurer (Lead Urban Specialist/TTL); Robert Bou Jaoude (Financial Management Specialist, MNACS); Rosanna Nitti (Sr. Urban Specialist); Sepehr Fotovat Ahmadi (Procurement Specialist); Ali Reza Abedini (Consultant)

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Supervision Mission April 17, 2006:

Robert Maurer (Lead Urban Specialist/TTL); Robert Bou Jaoude (Financial Management Specialist, MNACS; Rosanna Nitti (Sr. Urban Specialist); Sepehr Fotovat Ahmadi (Procurement Specialist); Ali Reza Abedini (Consultant)

Supervision Mission June 27, 2007:

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Supervision Mission December 19, 2007:

Robert Maurer (Lead Urban Specialist); Robert Bou Jaoude (Financial Management Specialist, MNACS; Rosanna Nitti (TTL/Sr. Urban Specialist); Sepehr Fotovat Ahmadi (Procurement Specialist); Velayutham Vijayaveri (Sr. Procurement Specialist); Niels B. Holm-Nielsen (Hazard Risk Management Specialist);

Supervision Mission June 24, 2008:

Robert Maurer (Lead Urban Specialist); Robert Bou Jaoude (Financial Management Specialist, MNACS; Rosanna Nitti (TTL/Sr. Urban Specialist); Velayutham Vijayaveri (Sr. Procurement Specialist); Sepehr Fotovat Ahmadi (Procurement Specialist); Niels B. Holm-Nielsen (Hazard Risk Management Specialist);

Supervision Mission December 23, 2008:

Robert Bou Jaoude (Financial Management Specialist, MNACS; Rosanna Nitti (TTL/Sr. Urban Specialist); Sepehr Fotovat Ahmadi (Procurement Specialist)

Supervision Mission June 3, 2009:

Robert Bou Jaoude (Financial Management Specialist, MNACS; Sepehr Fotovat Ahmadi (Procurement Specialist)

(a) Task Team members

Names	Title	Unit	Responsibility/ Specialty
Lending			
Supervision/ICR			
Ali Reza Abedini	Consultant	MNSIF	MIS
Robert Bou Jaoude	Sr. Financial Mgmt. Specialist	MNAFM	Financial Mgmt.
Antonio J. Cittati	Consultant	AFTEN	Project Support
Mouna Couzi	Senior Program Assistant	MNCLB	Project Support
Sepehr Fotovat Ahmadi	Procurement Specialist	MNAPR	Procurement
Elena Gagieva-Petrova	Program Assistant	FPDVP	Project Support
Niels B. Holm-Nielsen	Hazard Risk Management Special	LCSUW	Hazard Mgmt.
Christianna Johnnides	Urban Specialist	FEU	Urban Mgmt.
Dahlia Lotayef	Sr. Environmental Spec.	MNSSD	Environment
Robert Maurer	Lead Urban Sector Specialist	MNSSD	Urban Mgmt.
Balakrishna Parameswaran	Sr. Urban Spec.	FEU	Urban Mgmt.
Thao Le Nguyen	Senior Finance Officer	LOAFC	Disbursements
Rosanna Nitti	Sr. Urban Spec.	MNSSD	TTL
Alessandro Palmieri	Lead Dam Specialist	OPCQC	Dam

Helen Z. Shahriari	Sr. Social Scientist	ECSSD	Social
Hany Shalaby	E.T. Consultant	MNSRE	Project Support
Hiba Muawyah Tahboub	Lead Procurement Specialist	OPCPR	Procurement
Velayutham Vijayaverl	Senior Procurement Specialist	MNAPR	Procurement
Azeb Yideru	Program Assistant	MNSSD	Project Support
ICR			
Richard James	Operations Consultant	MNSSD	Primary Author
Alison Cave	Sr. Urban Dev. Specialist	ECSS6	Peer Reviewer
Margaret Arnold	Sr. Social Dev. Specialist	SDV	Peer Reviewer

(b) Staff Time and Cost

Stage of Project Cycle	Staff Time and Cost (Bank Budget Only)	
	No. of staff weeks	USD Thousands (including travel and consultant costs)
Lending		
FY03	33	250.24
FY04	1	1.62
FY05		2.47
FY06		0.00
FY07		0.00
FY08		0.00
Total:	34	254.33
Supervision/ICR		
FY03		0.00
FY04	28	144.05
FY05	54	266.91
FY06	48	212.58
FY07	39	164.02
FY08	29	145.18
FY09	10	108.00
Total:	208	1,040.74

Annex 5. Beneficiary Survey Results

Introduction

The beneficiary assessment (BA) is based on the field work that was conducted in March 2010 in the four provinces by way of individual and group interviews with final and intermediate beneficiaries, and by direct observation. Around two dozen sub-projects were directly probed by the BA research team in different locations across Kermanshah, Hamadan, and Zanjan. For Qazvin province, the results of a separate social assessment commissioned by EERP and conducted toward the end of 2009 were used. The BA also benefited from the findings of earlier assessments and supervision reports prepared by the World Bank staff.

Housing, social and public infrastructure

EERP reconstructed damaged homes and significantly improved access to and quality of public and social services. Most beneficiaries expressed satisfaction with the reconstruction efforts and improved services such as potable water, roads, and housing. Yet, some problems and challenges were discovered stemming from hasty project formulation without prior studies, lack of compatibility between the sub-projects and the local community's main priorities or their lifestyles and social structures, lack of coordination among line agencies, and use of non-durable construction materials.

Housing

All households with damaged houses received reconstruction facilities to rebuild their homes. Beneficiaries benefited from a loan from the Housing Foundation's standard home plan (~40 sqm), but had to use their own resources for larger plans. In the process of reconstruction, some villages located in high-risk areas were relocated altogether. The relocation was achieved with the participation of the community and using local labor in some cases. But in others, due to local conflicts and lack of capacity, the Housing Foundation managed the relocation without much input from the locals. The BA team discovered general satisfaction with regard to the constructed houses as well as the relocations in the few example sites it visited (for example in Hoseynabad and Kusajabad in Zanjan and Dastjerdeh Sofla in Kermanshah). Yet, although the standard home designs sped up the reconstruction process, in many instances the constructed housing is incompatible with rural lifestyles, social conditions, and different needs among various households. For this reason, some rural residents have altered their home layouts – unfortunately without paying due attention to technical aspects of construction. In particular, some households use the reconstructed homes to keep their animals while they have built additional spaces for their families. These additions are not constructed according to safety standards.

Village Guidance Plans

These plans intended to improve the spatial organization of the villages as well as to enhance motorized traffic and surface water drainage. In some of the villages, the guidance plans have been implemented in haste and without paying due attention to physical, social, cultural, or economic issues. In some cases, piped water and sewerage projects were implemented after the completion of the guidance plans. The result has been the destruction of asphalt pavements. Furthermore, streets in some of the villages lacking piped water have been paved using cobblestones/cement which is difficult to remove and repave. In most villages where the guidance plans were implemented, only parts of the streets/alleys have been covered. This has created dissatisfaction among some village residents. As an example, in the village of Hoseynabad (in

Khodabandeh) visited by the research team, a number of houses as well as electric poles were relocated to make room for the extension of a village street. However, while the sub-base has been created for this part of the street, the pavement has not been completed and there does not seem to be any funds available for this purpose. Villagers' sense of ownership of the project is at minimal levels, in particular among relocated households. Furthermore, the constructed curbside/surface drainage in some areas is already showing signs of deterioration. It should be mentioned that in another village in the area (Kusajabad), the quality of construction was found to be better. In retrospect, it should have been made sure to allocate enough funding for the village guidance plans to cover the villages more thoroughly. Also efforts should have been made to understand village residents' priorities, and to minimize disruptive, low-quality and wasteful activities. The sustainability of the village guidance plans should have also been taken more seriously.

Schools

Despite the overall satisfactory situation of the school sub-projects, a few problems were recorded by the BA research team. Since no funding was allocated for the purchase of land in rural areas (which was in line with the policy of the School Renovation Organization as well), some school construction sub-projects in rural areas faced land acquisition problems. There were also problems associated with inadequate needs assessments. As an example, the Shahid Chamran High School for boys in Dinawar was constructed with 6 classrooms. However, according to the school officials, the predecessor of this high school already had 10 classrooms. A similar problem was observed in the Andisheh Vocational High School for girls in Soltaniyeh (Zanjan) where a space larger than that of the typical classrooms is needed for the tailoring workshop. The gym is now being used for this purpose, while one of the classrooms has been designated as the gym which does not seem to be functional. Furthermore, construction workers were present in the school grounds during the first two months of the academic year while some of the services were not available. Despite these problems, teachers and students are satisfied with the new school since the new building is far superior to what they had before. Also, as a very positive case, in Abé Garm, construction of schools was found to have been well-planned based on a needs assessment and prior engineering and soil test, as recorded by the separate social study commissioned by the EERP.

Fire Stations

The management and personnel of the fire stations/fire departments in the four provinces are very satisfied with the implemented sub-projects and acknowledge that the new stations have enhanced the coverage of emergency service delivery in the target urban areas and have decreased response time significantly. In Hamadan, the Fire Department staff claimed that the newly-constructed fire station had halved the response time in certain parts of the city. In Kermanshah, the management of the Fire Department reported that the newly-constructed fire station was the only standard design in the city and had become a model for the construction of future fire stations. Yet, in spite of the general satisfaction of the Fire Department management and staff with the newly-constructed fire station in Kermanshah, the building is not comparable to the much higher quality design of the fire station in Hamadan. Furthermore, the management of the Fire Department in Kermanshah reported shortages of fire engines and other necessary emergency equipments.

Red Crescent Society

The readiness of the Red Crescent Society is of high importance in the overall capacity of the disaster management system. In Hamadan, before the construction of the Red Crescent Society

Training Center Annex, training services were offered in a limited manner. Following the construction of the new training building under the EERP, the quantity of training courses offered has increased, and considering the availability of more space for the needed equipment the quality has also improved. The management of Hamadan's Red Crescent Society, the head of the Training Center, and the trainers expressed satisfaction with the new building. This said, it was stated that more space would still be needed as dormitory and for accommodating extra training sessions offered during summer. Furthermore, some of the equipment currently used in the center is very old and in need of replacement. The satisfaction of the Society's management and staff notwithstanding, the actual construction of the center was not without problems. The initial plan for the building was drawn hastily and subsequent changes were costly. Furthermore, the rise in the price of construction materials meant that the funds for the construction of the buildings were subsequently rendered inadequate. Part of the cost was ultimately covered from the Red Crescent Society's own resources. Yet, overall the project has been quite successful.

Health Facilities

Health facilities selected for EERP funding were found to be appropriate and of high priority. This was thought to be due to the needs assessments conducted on an annual basis by the Office of Health and Medical Education in each province which determines provincial priorities. As an example, the Health and Treatment Network facilities visited by the research team in Kabudarahang, Hamadan, was selected based on predetermined priorities and had few problems during implementation (although it lacks elevators and soundproof windows). Another important project completed under EERP is the Emergency Section at the Kabudarahang Hospital. With the construction of the new annex for the Emergency Section, the old emergency room is used as a special care unit. This project was considered highly beneficial by the hospital staff. As somewhat of a counter example, in Abé Garm (Qazvin), the medical facilities covered by the separate EERP social study were found not to be operating at full capacity due to lack of medical personnel and equipment despite the general beneficiary satisfaction.

Rural Roads

The BA research team recorded a high level of beneficiary satisfaction with regard to the rural road initiatives it visited. For example, the 64 km road constructed in Zanjan under EERP was found to be a great achievement considering the piecemeal construction approaches usually followed in the rural areas. Furthermore, the BA research team recorded significant benefits of the newly constructed Kolanjin-Abé Garm highway and also the rural Razak-Buin Zhara road to the local communities in the area. In particular, the rural road was found to have facilitated the transport of agricultural produce to markets elsewhere and has enhanced access to medical and health services. However, the quality of the constructed roads was not found to be at a high level in terms of sub-base, bridges, slopes, and turns. Furthermore, some conflicts surrounding the eminent domain were recorded across the provinces. Apparently the extent of these problems was not large and the conflicts were resolved relatively quickly by offering a fair price for the land.

Piped Water

Beneficiaries are generally very satisfied with water and sewage initiatives. However, in some instances certain problems have prevented the water delivery to the households, and some piped water sub-projects caused water conflicts. As an example, in the Khodabandeh area of Zanjan, of the 33 defined potable water projects, only 11 have become fully operational. In some cases, the main water network has been constructed but local pipes have not been laid down. In others, the

needed electricity has not been provided. For these reasons, a large number of potential beneficiaries have not been able to receive their promised water. They are highly dissatisfied as a result. Furthermore, water conflicts were reported by the Water and Sewage Company. In particular, it was reported that in one instance in Zanjan (Abé Sofla Water Supply Network), the residents of one village where the source well was dug to provide water to several surrounding villages had destroyed the facilities at one time. The conflict had to be addressed through the police and the judicial system although the water company had purchased the land for the source well. Furthermore, it did not become clear to the BA research team whether or not adequate environmental and social studies had been conducted for the water initiatives.

Economic Recovery sub-projects

The economic recovery part of EERP included a diverse group of sub-projects – from rural irrigation networks to livestock production to cold storage facilities. Some of these subprojects identified by local agencies have been complex in terms of social and environmental safeguards. Furthermore, in hindsight, these subprojects could neither constitute an actual economic recovery package nor explicitly relate to such goals as employment and income generation or empowerment. Several of the subprojects formulated for economic recovery were eventually cancelled due to their technical complexity. Notwithstanding the technical complexity of some of the sub-projects against the background of low-level local capacity, inclusion of these subprojects under EERP made the already difficult task of reconstruction more cumbersome by diverting the project's focus. Also, since some of the subprojects were formulated in a quick and haphazard manner, their implementation, while certainly beneficial, is questionable in terms of costs versus benefits (for example in very small and remote villages). Finally, the most important goals of employment generation and empowerment have not been explicitly pursued in the sub-projects. Nonetheless, many of the subprojects visited by the BA team were found to be highly beneficial (e.g., cold storage facilities in Kabudarahand) or relatively successful (e.g., agricultural projects in Qazvin) although others were found to be problematic (e.g., diversion dam in Qanlu of Zanjan) or facing difficulties (irrigation project in the village of Shakhdar in Qazvin).

Annex 6. Stakeholder Workshop Report and Results

Introduction:

The stakeholder analysis recorded the opinions of key players in the project to shed light on the strengths and weaknesses of the initiatives as well as the implementation obstacles they faced. Individual and group interviews were conducted with provincial line agency managers, project supervisors, contractors, and the provincial PMU/CMU staff in Qazvin, Zanjan, Hamadan, and Kermanshah, as well as the PMU/CMU staff in Tehran. A final stakeholder workshop was held in Tehran with the participation of project management to confirm research results.

Findings:

Strengthening disaster management capacity

The EERP has made contributions to enhancing public sector capacity to prevent, respond to and recover from natural disasters. For example, it is believed that EERP has contributed to the passage of the national law that institutionalized the National Disaster Management Taskforce. Furthermore, EERP has also strived to strengthen public sector institutional capacity to deal with disasters at the provincial level. The main activities toward this goal were workshops with local implementing agencies, engineering companies and local contractors and commissioning of a number of risk reduction studies (in particular micro-zoning in the four provinces). A workshop series was conducted early in the project in 2004 as the first step of a long-term process to transfer ownership of the problem to local communities, define action plans that reflect the local realities and include implementation strategies, and incorporate representatives of all the community sectors in risk reduction and disaster preparedness activities. The workshops were designed with the specific objective of starting long-term earthquake risk reduction programs in the project provinces with the active participation of local authorities, institutions and general public. The workshop series helped participants realize that prevention and mitigation activities, with the participation of the entire community, need to be implemented in addition to the crisis management and emergency response. Yet, follow up on this workshop series has been weak. Other workshops were only realized late in the project for the provincial disaster taskforces and specific training was only delivered to some local builders and to some provincial engineers on retrofitting. A public awareness initiative was also followed mainly through publishing of brochures. It is not clear what the impact of these initiatives has been. For example, a research project commissioned by BEERP, which included an assessment of social vulnerability in Qazvin, Zanjan, Hamadan, and Kermanshah found low levels of awareness and knowledge of earthquake risks in the capital cities of the four provinces.

Learning and capacity-building

Increased project implementation capacity in line agencies and local contractors has been among the most important effects of the EERP. According to the interviewed line agency key personnel and local contractors in the project, a great deal of learning-by-doing and interactive learning took place during the implementation of the project. New concepts such as social and environmental assessments have been introduced to local agencies. In particular some respondents among line agency representatives stated that they had adopted better procedures for land acquisition based on what they had learned through EERP. Certain World Bank bidding and contracting procedures have also been adopted by some of the agencies involved in EERP. As a result of the project certain new implementation and legal capacities in the Iranian context were identified that would expedite the implementation of similar projects in the future. Furthermore, some of the previously inadequate procedures have been revised. Line agency personnel who participated in our group

discussions believed that they had become much better in carrying out initiatives similar to those conducted under EERP.

Speedy Project Formulation

The research team's discussions with various line agency officials, PMU/CMU staff in the provinces, contractors, and final beneficiaries indicated that some of the projects were included under EERP without due diligence. In particular, at the time of EERP formulation line agencies were given a short period of time to list their priorities in the earthquake-stricken area. Many of the agencies did not have well-thought of plans but saw the occasion as an opportunity to access EERP's funds. The research team encountered examples of this kind among agriculture, school and road sub-projects. Hasty formulation of these projects resulted in implementation delays.

Difficulty in supervising a diverse number of projects

The diversity of the projects has made their supervision very difficult. This has been particularly the case for those sub-projects that sought to improve the economic situation of the beneficiaries and reduce their vulnerability. Most of these projects have been needed in light of the underdeveloped situation of the target areas. Overall, beneficiaries have expressed satisfaction with the outcomes of these projects. However, supervising these projects in practice has been quite problematic. For example, the Housing Foundation, the CMU, or the PMU have not really had the capacity to supervise 'agriculture' projects. Furthermore, the project was never able to develop a comprehensive monitoring and evaluation system.

Supervision structure

Projects were supervised and required endorsement at several levels. This structure of supervision allowed for the enforcement of a set of minimum quality standards according to the CMU/PMU staff. Yet, opinions expressed by line agency personnel and contractors regarding supervision were mixed. Some believed that the multi-tiered supervision created unnecessary obstacles to the smooth implementation of sub-projects and were redundant and confusing. In particular, they stated that it was never clear who would have the final say regarding a sub-project. They claimed to have never figured out whether project supervision and endorsement were up to the contracted supervisor or the responsibility of the line agency, provincial CMU/PMU personnel, or the PMU and CMU in Tehran. Some contractors had to wait for several months to get paid and slowed down their operations as a result. There was little coordination among various institutions responsible for supervision. Furthermore, some of those responsible for supervision lacked the technical capacity to gauge the performance of certain projects. The situation was said to have been exacerbated due the changes in the EERP management. Related to the above problems was the unfamiliarity of line agency personnel and contractors with World Bank procedures followed by EERP. Yet, some line agency managers believed that the multi-tiered supervision procedure, while cumbersome at times, had been responsible for the higher quality of projects implemented under EERP and has curbed possible financial irregularities.

Contracts and financial procedures

Many of the line agency personnel and contractors interviewed for this report are of the opinion that the World Bank contracts had been problematic and responsible for delays. Specifically, the contracts were considered ambiguous within the Iranian context and less flexible in terms of prices against the background of a high rate of inflation in Iran. The CMU personnel interviewed also believed that the contracts used for EERP were different from, and sometimes contradictory

to, the experience of line agencies and contractors; however, once the CMU addressed the ambiguities and contradictions, the problems were solved. Furthermore, some interviewed line agency personnel and managers believed that EERP contracts were superior to traditional Iranian contracts in that they upheld the rights of both the client and the contractor. Also, the relative inflexibility of the EERP contracts in fact prevented long delays in the implementation of the projects since it was to the benefit of the contractor to finish the project on time. Yet, the contractors interviewed claimed they did not know who exactly the clients in their contracts were. They felt that they had to report and coordinate with too many persons/institutions/places.

Related to the above is the incompatibility of Iranian financial procedures with those of the World Bank followed in EERP. Iranian financial comptrollers have been trained and are obligated to follow Iranian public sector financial regulations.

In some cases, the hired contractors were found too weak to carry out their sub-projects. This resulted in the cancellation of these initiatives. Some of the line agency officials interviewed by the BA research team believed that the World Bank procedures together with the contractors' grading scheme of the Management and Planning Organizations allowed larger non-local contractors as well as large contractors with experience in projects other than what they were bidding for to get the contracts. Lack of familiarity with either the project type or the locality was believed to have caused some of the cancellations.

Lack of attention to people's priorities and social/environmental issues

Overall, the level of participation by people in project identification, formulation, and implementation has been low. Also, it appears that little effort was made by the management of line agencies to seek people's inputs. Furthermore, there has been little systematic process for individual initiatives to address social/environmental issues. As also suggested by the earlier World Bank mission, in most cases, line agencies at the local level and the communities sorted out the issues. This unsystematic approach has caused tension and delays. Also, although the majority of projects have been well justified and have addressed major needs of the local communities they served, there have been instances of projects low on the list of priorities. For example, some of the village guidance schemes probed by the BA research team were implemented as a priority when the villagers thought what they needed most had been water. In an Abé Garm case, a water reservoir had been constructed without connections to the water network which had to be planned by the Water and Sewage Company subsequently, as reported by the separate EERP social study.

Lack of coordination among agencies

Lack of coordination among local agencies created problems on various occasions. For example, in Hamadan little coordination was made between the work of the Housing Foundation implementing village guidance plans and those of other agencies in charge of other aspects of village development (Agricultural Jihad, Water and Sewage Company, Electric Companies, etc.). As another example, in the village of Jamishan in Kermanshah, electricity was provided to the village before the implementation of the guidance plan. As a result some of the electric poles had to be moved to make room for the guidance plan roads. As reported by the earlier World Bank mission, in some cases where successful completion of a sub-project depended on the provision of supporting infrastructure (for example bridges for rural road in Zanjan) long delays were experienced.

Unfamiliarity with procedures

Several of the representatives of line agencies interviewed by the BA research team believed that the unfamiliarity of their staff with the World Bank procedures slowed down progress in the initial stages of project implementation. However, over time the process of learning by doing helped them to speed up the implementation of their respective subprojects. Also, the Housing Foundation officials needed time to familiarize themselves with the World Bank procedures. The resulting delays could have probably been shortened with appropriate action to train and familiarize Housing Foundation executive staff and management respectively.

Furthermore, Iranian firms bidding on various project components were quite unfamiliar with the World Bank procedures and procurement requirements. In hindsight a much more focused effort would have been required to familiarize firms with the procedures and to avoid misunderstandings and delays. The unfamiliarity of line agencies with the Bank procedures and guidelines could have been addressed with training and information dissemination on the bidding process, hiring consultants, contracts, and financial management. Yet, the case of financial comptrollers is more difficult to address since the problem comprises both unfamiliarity and lack of compatibility between Iranian and the World Bank financial regulations.

Also, the project faced some financial difficulties as a result of delays in allocation of Government counterpart funds. These delays seem to have been associated with the lack of familiarity with the World Bank procedures at the Management and Planning Organization.

Technical capacity at the PMU/CMU

The EERP PMU/CMU faced technical capacity problems during project implementation. The problems were caused by both the diversity of the initiatives undertaken by EERP and the difficulty in attracting all the quality personnel the project needed. Changes in the EERP management as well as in the management of counterpart government/public agencies caused interruptions in the work of the project. More importantly, there was no succession procedure to transfer lessons learned and experiences.

Changes in Government Regulations

Among issues that affected the project negatively was the change of regulations. Specifically, the removal of subsidies on road construction materials during the course of the project significantly changed the prices the contractors were facing and caused serious difficulties and delays.

Land Acquisition

Many of the contractors interviewed believed that land acquisition procedures and eminent domain issues were difficult to solve in EERP. This has been due to rapid formulation of the sub-projects, expectations made in the contracts (fixed prices) to finish the projects in a rapid pace, and little allowance made for land acquisition problems. Land acquisition and eminent domain issues were reported to have created significant problems in the case of many sub-projects. This said, the contractors believed that little coercion was used to acquire the needed lands for the projects and all land parcels were provided by owners voluntarily and with due compensation (except for school lands which were donated). However, there were times when land conflicts were not with private citizens but with other public agencies. For example in the case of the Nurin fork in Zanjan, gas and oil pipelines did not allow for the project to finish. The project remains unfinished and a safety hazard.

Annex 7. Summary of Borrower's ICR and/or Comments on Draft ICR

(The Borrower's ICR not yet received)

Annex 8. Comments of Co-financiers and Other Partners/Stakeholders

Annex 9. List of Supporting Documents

1. Project Technical Annex (Report No.: T7588-IR), May 5, 2003
2. Back to Office Reports and Aide-Memoires April 2003 through December 2008
3. Implementation Status Reports July 2003 through June 2009
4. Mid Term Review Report, May 4-17 and July 9-12, 2005
5. Loan Agreement Report No. 4697-IRN), August 28, 2003
6. Operating Manual, April 2003
7. Progress Report # 11, August 2007

