

ASIAN DEVELOPMENT BANK

TAR: AFG 36180

**TECHNICAL ASSISTANCE
TO THE
REPUBLIC OF AFGHANISTAN**

FOR

**DISASTER PREPAREDNESS AND MANAGEMENT
CAPACITY BUILDING**

May 2002

CURRENCY EQUIVALENTS

(as of 11 May 2002)

Currency Unit	–	Afghani (AF)
AF1.00	=	\$0.00003
\$1.00	=	AF34,000

ABBREVIATIONS

ADB	–	Asian Development Bank
GIS	–	geographic information system
IAA	–	Interim Authority of Afghanistan
NGO	–	nongovernment organization
ODP	–	Office of Disaster Preparedness
TA	–	technical assistance
UN	–	United Nations
UNDP	–	United Nations Development Programme

NOTE

In this report, "\$" refers to US dollars.

I. INTRODUCTION

1. Three major earthquakes hit northeastern Afghanistan in and around Nahrin District of Baghlan Province in a 5-week period from 3 March to 12 April 2002, together killing 1,000 people or more. Deaths resulted from landslides and collapsed structures. The affected area extends up to 15 kilometers around Nahrin, with 40 villages and an estimated population of 80,000 affected. In April 2002, flash floods in Badghis province in western Afghanistan washed away more than 500 homes, adding to the suffering of the conflict-ravaged population. Also in April 2002, a Moroccan locust outbreak hit the Khajaalwan Valley in northern Afghanistan, the worst infestation of locusts the region had seen in 30 years, according to experts. Prior to these disasters, the country had suffered from 3 consecutive years of drought up to the 2001 cropping season, which depressed agricultural activities, the lifeline for more than 85% of the country's population. Similar natural disasters could hit the country at any time in the future. Currently, relief operations are related mainly to postdisaster emergency response rather than predisaster preparedness and impact mitigation, and the Government relies entirely on external assistance for relief activities. Being prone to these disasters, Afghanistan needs to build the capacity for increased disaster preparedness and management, which are essential for reducing the economic and social costs of disasters.

2. The Office of Disaster Preparedness (ODP)¹ under the Office of the Prime Minister is tasked with coordinating the response of the Interim Administration of Afghanistan (IAA) to disasters including earthquakes and drought. However, ODP is poorly equipped and has minimal budget and inadequate staffing. An Asian Development Bank (ADB) Fact-Finding Mission² discussed the situation with ODP as well as various external disaster relief agencies in Kabul and reached an understanding with the IAA on the purpose, output, cost, and implementation arrangements for technical assistance (TA).³ The TA is consistent with the thematic emphasis on capacity building in ADB's Initial Country Strategy and Program for Afghanistan.

II. ISSUES

3. While war and civil conflicts for more than two decades have prevented any systematic response to natural disasters, Afghanistan is now ready to start building its capacity for preparedness and management of such disasters. Some salient issues, especially for earthquakes and droughts, are summarized in paras. 4-7.⁴

4. Many earthquakes occur in the Hindu Kush, which is a region of high mountains and rough terrain. From a geologic perspective, the Hindu Kush represents a diffuse boundary between two major tectonic plates—the Indian and the Eurasian. These plates are converging at the rate of several centimeters per year, which has given rise to the tremendous mountain

¹ ODP was established in 1970 and survived different regimes with rise and fall of its staff size. Currently it is staffed by about 130 persons, of whom about one third are stationed at five zone branches in the provinces. ODP is headed by its president, followed by five department directors in Kabul. However, most of its staff have minimal training in up-to-date skills and knowledge to carry out its mandate.

² The Mission, comprised of M. Fujimura, Economist, visited Kabul on 9-12 May 2002, which was preceded by a consultation visit with the Asian Disaster Preparedness Center in Bangkok on 6-7 May. The Mission was assisted in Kabul by S. Qayum, Senior Liaison Officer, Special Liaison Office.

³ The TA first appeared in *ADB Business Opportunities* (Internet edition) in April 2002.

⁴ While it is not certain whether the recent flash floods and locust outbreaks in certain regions of Afghanistan will reoccur frequently, these types of disaster could be incorporated in the scope of the TA activities if found appropriate and complementary to assistance by other agencies.

ranges not only of the Hindu Kush, but also of the Himalayas. The Hindu Kush is unique in that earthquakes occur not only near the surface, but also at great depths. A number of deadly earthquakes occurred in the region in the last century. Two earthquakes in 1998 (4 February and 30 May) killed more than 9,000 people in Afghanistan.

5. The latest earthquake triggered a flood of assistance from the United Nations (UN) and nongovernment organizations (NGOs), and the emergency phase is winding down. Almost all immediate needs for both food and nonfood items have been covered by the relief distributions. The focus of the humanitarian assistance has shifted toward establishing a rebuilding plan for the area. The destroyed houses were made of mud bricks and were very vulnerable to tremors. Most families will be able to rebuild their homes on their own during the summer, but a medium-term solution to the expected frequent occurrence of earthquakes requires technical improvements for building design to make them more earthquake resistant. The rebuilt schools will have to be made with a more earthquake-resistant design and stronger materials. Kabul is the only city that has a seismic zoning map and for which types of soil and geologic structure maps and related data are available.⁵ To build a systematic information base for earthquake preparedness, TA is required to cover additional earthquake-prone areas in the country.

6. Not receiving summer rains, Afghanistan depends to a large extent on melting snows for irrigation water. A very low snowfall in the winter of 2000 and late and subsequent erratic spring rains have caused a serious shortage in the water supply. The southern regions of Kandahar, Nimroz, and Zabul were the worst hit. In 2001, the drought resulted in the near total failure of rainfed agriculture and substantially reduced irrigated farm production. As a result, the cereal import requirement in the 2001/02 marketing year (July/June) is estimated at 2.2 million tons, about double the volume of 1.1 million tons in 1999–2002. In addition to the impact on cereal production, the drought has dealt a serious blow to livestock in Afghanistan. To protect the remaining livestock population and to ensure the survival of the breeding stock, veterinary services and supplies are needed.

7. Failure to plant crops has been due to drought, lack of seeds and inputs, and large-scale displacement of the population due to internal conflicts. Missions undertaken by aid agencies in drought-affected districts indicate that those who do not leave are often the poorest and most vulnerable, who cannot even afford to pay for the travel. The sheer magnitude of the population in need, coupled with the limited resources and logistical constraints such as poor road access and security conditions as well as the lack of implementing partners, has significantly limited the collective ability of the aid community to reach all those in need before they have no option but to move. The effects of drought and fighting in some areas of the country are so intertwined that it is difficult to make a clear distinction about the main motivating factor for displacement. Aid agencies must be prepared to invest in longer term interventions as well as funding to help cope with emergency needs. This is especially crucial if currently displaced people are to recover and drought-affected, nondisplaced people are to be saved from further loss of assets. In particular, the needs of farmers and laborers who are encouraged by the IAA to give up poppy as their means of economic survival must be met.

⁵ They were developed by Kabul Polytechnic Institute and Kabul City Planning and Architectural Department. (Website: Mahmoud Samizay, Civil, Environmental and Infrastructure Engineering, George Mason University). When the fact-finding mission inquired about this, the ODP staff was not aware of this fact.

III. THE TECHNICAL ASSISTANCE

A. Purpose and Output

8. The main purpose of the TA is to support capacity building in ODP so it may become a credible coordination agency and a focal point for multidisaster efforts and issues in Afghanistan, from prevention and mitigation to relief and reconstruction. The TA will provide expert advice and training to support:

- (i) assessment of institutional and skills gap/training needs,
- (ii) assessment of database and information management system needs,
- (iii) establishment of a national disaster management committee,
- (iv) preparation of a framework for national disaster preparedness and management,
- (v) development of action plans for natural disasters, and
- (vi) enhanced awareness and readiness among key government officials to carry out further capacity building and specific action plans.

9. The logical framework for the TA is found in Appendix 1.

B. Methodology and Key Activities

10. The TA will be implemented in two parts, not necessarily in sequence but in an overlapping manner as necessary. Part A will comprise mainly analysis of institutional and capacity needs, formulating recommendations for strengthening preparedness, prevention, and mitigation, including preparation of disaster mitigation and management plans. Part B will involve awareness building and dissemination workshops as appropriate to lay the foundation for further capacity building and technical skills development in the long run. In both parts, the consultants will make maximum efforts to consult with the local population, the ultimate beneficiaries (see para. 4 in Appendix 2).

11. In the part A, the consultants will

- (i) review the existing institutional arrangements for natural disaster preparedness and mitigation, including the activities of major external assistance providers such as UN agencies and NGOs;
- (ii) recommend an appropriate organizational structure for a national disaster management committee;
- (iii) assess the skills and training needs at various levels of government;
- (iv) assess the database situation and the information management system, including the information network among major external assistance providers;
- (v) prioritize the areas of capacity-building interventions and disaster types in accordance with the importance of their damage mitigation impacts;
- (vi) recommend an appropriate organizational setup and resource requirements for training and awareness building at various levels of government; and
- (vii) formulate the framework for natural disaster mitigation and management at various levels of government, and recommend prioritized action plans for the short to medium term.

12. In part B, the consultants will provide technical inputs to ODP for

- (i) organizing workshops and trainings at various levels of government, and if possible at selected locations that are known to be prone to disasters, to enhance awareness and disseminate the recommendations made in part A of the TA; and
- (ii) if deemed necessary and effective, organizing regional study trips for key government officials in disaster management.⁶

C. Cost and Financing

13. The cost of the TA is estimated at \$550,000 equivalent, consisting of \$324,000 in foreign exchange cost and \$226,000 equivalent in local currency cost. ADB will provide \$500,000 equivalent to finance the entire foreign exchange cost and \$176,000 equivalent of the local currency cost on a grant basis from the ADB-funded TA Special Fund. The Government of Afghanistan will contribute about \$50,000 equivalent in kind. Considering the extremely constrained financial capacity of the IAA and ODP, the less than required counterpart financing share of 15%⁷ is justified. It is proposed that this requirement be waived. The detailed cost estimates and financing arrangements are presented in Appendix 3.

D. Implementation Arrangements

14. ODP will be the Executing Agency for the TA. Under the overall guidance of ODP, the TA activities will be coordinated closely with line ministries relevant to disaster preparedness and management, e.g., ministries of Public Works, Agriculture, Irrigation, and Water Resources. Also, ODP and the consultants will closely coordinate the TA activities with external assistance agencies and NGOs active in this area.⁸ ODP will provide counterpart professional and secretarial staff, local transportation, local communication facilities, and suitable office space.

15. An estimated total of 20 person-months of consulting services (4 person-months of international and 16 person-months of domestic) will be required. The international consultant, as team leader, will have overall skills and experience in disaster management, adaptable to the Afghan context. The team leader will determine the appropriate skills mix of the domestic consultants as well as the short-term expertise required for skills gap/needs assessment and awareness-building workshops in each specialized area (see paras. 5-9 in Appendix 2). The consultants will be recruited in accordance with ADB's *Guidelines on the Use of Consultants* and other arrangements satisfactory to ADB for the engagement of domestic consultants. Procurement of the equipment will be undertaken in accordance with ADB's *Guidelines for Procurement* under a direct purchase mode.

⁶ The consultant team leader will formulate a set of transparent criteria for selecting participants in consultation with ADB supervising staff.

⁷ Project Administration Instruction 5.11.

⁸ United Nations Development Programme (UNDP) is providing about \$150,000 from its own budget to strengthen ODP and has further plans for assistance. The Mission agreed with UNDP that the TA will closely coordinate with UNDP assistance. Also the Mission was told that a UN disaster management unit in Geneva stands ready to operate in this area for Afghanistan and will be the key coordinating partner for this TA. Other active disaster relief agencies include the World Food Programme, United Nations Office of Coordination for Humanitarian Affairs, United Nations High Commissioner for Refugees, United Nations Children's Fund, United Nations Office for Project Services, United Nations Drug Control Program, and United Nations Centre for Human Settlements/Habitat. Among active NGOs in disaster relief are the International Committee of the Red Cross/International Federation of Red Cross, Medical Emergency Relief International, Medecins sans Frontieres, Agence d'Aide a la Cooperation Technique au Developpement, CONCERN Worldwide, Norwegian Afghanistan Committee, Oxford Famine Relief Programme, and Swedish Committee for Afghanistan.

16. The TA is expected to commence in June or July 2002 and to be carried out over a period of up to 12 months.⁹ The consultants will prepare an inception report at the end of the first month, an interim report at the midpoint of the implementation period, a draft final report at the end of the month preceding the completion month, and a final report at the end of the completion month. The three draft reports will each be discussed at a tripartite meeting to be held following their submission to ODP and ADB.

IV. THE PRESIDENT'S DECISION

17. The President, acting under the authority delegated by the Board, has approved the provision of technical assistance not exceeding the equivalent of \$500,000 on a grant basis to the Government of Afghanistan for Disaster Preparedness and Management Capacity Building, and hereby reports this action to the Board.

⁹ This flexible arrangement was suggested by the Afghanistan Assistance Coordination Authority, and agreed to by the Mission.

TECHNICAL ASSISTANCE FRAMEWORK

Design Summary	Performance Indicators/Targets	Monitoring Mechanisms	Assumptions and Risks
Goal <ul style="list-style-type: none"> Reduction in the severity of impact of disasters in Afghanistan 	<ul style="list-style-type: none"> Improved preparedness and speedier and better orchestrated response to disasters 		
Purpose <ul style="list-style-type: none"> Improved capacity of the Office of Disaster Preparedness (ODP) as a credible coordination agency and the focal point for multidisaster-related efforts and issues in Afghanistan 	<ul style="list-style-type: none"> Enhanced coordination among government and nongovernment agencies Improved awareness, knowledge and capacity of ODP to handle future disasters 	<ul style="list-style-type: none"> Tripartite meetings among ODP, the consultant team, and the Asian Development Bank (ADB) TA progress reports Minutes/records of management committee meetings 	<ul style="list-style-type: none"> The Government will approve the outputs of the technical assistance (TA) and take over and implement its recommendations
Outputs <ul style="list-style-type: none"> Establishment of a national disaster management committee Enhanced awareness and readiness among key government officials and beneficiaries 	<ul style="list-style-type: none"> The committee and its coordination mechanism are established Awareness and dissemination workshops are effective 	<ul style="list-style-type: none"> ADB participation in tripartite meetings and TA progress reports. Evaluation by counterpart government staff, workshop participants, and beneficiaries 	<ul style="list-style-type: none"> Efficient communications and feedback among relevant agencies are feasible at the national and provincial levels Qualified counterpart staff are available in ODP for knowledge transfer
Activities <ul style="list-style-type: none"> Assessment of institutional and skills needs, and database information management system Preparation of a framework for national disaster preparedness and management Development of 	<ul style="list-style-type: none"> The assessments are completed The framework is prepared The action plans are 	<ul style="list-style-type: none"> ADB participation in tripartite meetings and TA progress reports 	<ul style="list-style-type: none"> Qualified counterpart staff are available in ODP for knowledge transfer

Design Summary	Performance Indicators/Targets	Monitoring Mechanisms	Assumptions and Risks
specific action plans for prioritized disaster types	developed		
Inputs <ul style="list-style-type: none"> • Specialist services (international and domestic consultants) • Awareness and dissemination workshops 	<ul style="list-style-type: none"> • Consulting services for a total of 20 person-months, and training workshops • ADB financing of \$500,000 equivalent for the TA 	<ul style="list-style-type: none"> • ADB review and regular review by the disaster management committee 	<ul style="list-style-type: none"> • TA consulting inputs are approved • Consultant's performance is satisfactory

OUTLINE TERMS OF REFERENCE FOR CONSULTANTS

A. Part A

1. The team leader's (4 person-months) main activities will include the following three aspects. During the initial period of the technical assistance (TA) implementation, through institutional assessment and dialogue with aid agencies, the team leader will determine an appropriate skills mix of domestic consultants (16 person-months) and make their engagement arrangement.

1. Institutional Setup and Policy Planning

2. The consultants will do the following:

- (i) Review existing central and provincial government organizations, strategy, and planning for disaster preparedness and management.
- (ii) Analyze the institutional capacity for disaster preparedness from the central core level to the provincial, municipal, and district levels. Assess skills gaps faced and training needs.
- (iii) Identify major international and domestic actors actively engaged in disaster relief, preparedness, and management activities; and assess their strategies, organizations, and implementation arrangements.
- (iv) Conceptualize, in consultation with the identified actors, a suitable organizational structure for a national disaster preparedness and management committee, and the role of the Office of Disaster Preparedness (ODP) in it. Propose an appropriate level of authority delegated from the head of the nation. Propose appropriate forms of subnational level participation in the structure.
- (v) Guide ODP in the establishment of such a committee. Consider the possibility of establishing disaster management cells with specialized sector skills (e.g., geographic information system (GIS), information and communication technology, flood forecasting, locust forecasting, water resource management, media mobilization) in relevant line ministries that have reporting obligations to ODP.
- (vi) Coordinate the formulation of a framework for disaster mitigation and management plans at various levels of government.
- (viii) Prioritize the areas of capacity-building interventions and disaster types in accordance with the importance of their damage mitigation impacts.
- (ix) Recommend an appropriate organizational setup and resource requirements for training and awareness building at various levels of government.
- (x) Formulate a framework for natural disaster mitigation and management at various levels of government, and recommend prioritized action plans in the short to medium term. (Among the action plans, consider the possibility of compulsory disaster insurance schemes, e.g., in the form local property tax, if there are feasible examples from elsewhere.)

2. Data and Information Technology

3. The consultants will do the following:

- (i) Assess the existing disaster management communication system, including the information network among major external assistance providers.

- (ii) Make recommendations for appropriate design of a database—a disaster management information system—including GIS maps (e.g., base maps; slope instability maps; geomorphic hazard maps; population distribution, settlement, land use, and town maps).
- (iii) Guide the ODP in coordinating the external assistance providers in establishing an efficient system of information sharing and database development including spatial and nonspatial data to supplement hazard maps for the country and its provinces/districts as needed.

3. Public Awareness and Agency Coordination

4. The team leader will help ODP design and implement focused inter-agency and public awareness workshops in Kabul and selected disaster-prone provinces and districts, including distribution of suitable information material, support for community representation in the workshops, and assistance in public awareness activities. In so doing, the consultants will give particular consideration to the following aspects:

- (i) Assess the existing social, cultural, and political structures of the communities to identify possibilities and limitations for ensuring community participation in coordinated disaster preparedness and management activities.
- (ii) Recommend appropriate participatory processes for implementing prevention and rehabilitation efforts in such aspects as housing and village design, and actual construction practice, paying particular attention to functional and institutional arrangements to enhance interaction among the relevant government institutions and agencies and the population in disaster-prone areas.
- (iii) Recommend effective liaison mechanisms among government and nongovernment organizations involved in disaster preparedness and management.
- (iv) Recommend effective communication mechanisms among community leaders to foster awareness of the importance of coordinated disaster mitigation efforts.
- (v) Ensure that women and vulnerable groups are adequately represented in the community consultations and dissemination workshops.

B. Part B

5. Awareness building, training workshops, and study trips focusing on each disaster type could include the following. Prioritization among these disaster types and depth of coverage will be determined by the team leader in the initial period of TA implementation.

1. Earthquake Preparedness and Management

6. The consultants will do the following:

- (i) Review engineering studies to determine the vulnerability of buildings and essential public service systems and structures; and prepare risk scenarios.
- (ii) Analyze existing information on the magnitude and frequency of past events, facilitate incorporation of the information into an available database system, and contribute to the preparation of hazard maps.
- (iii) Review specific needs for mitigation of disaster impacts; and prescribe suitable measures, including improving resistance of essential services, reinforcement of buildings, and land use restrictions.

- (iv) Assess the applicability of prospective earthquake-resistant structural designs, taking into consideration local material availability, affordability to local people, ease of maintenance and repair, and relevance to lifestyle of the local area.
- (v) Assess the adequacy of available in-country capacity and external assistance in the area of suitable building materials and technologies for earthquake preparedness, and recommend necessary steps to promote retrofitting and seismic strengthening of existing housing and infrastructure.

2. Drought Warning Systems and Damage Control Management

7. The consultants will do the following:

- (i) Review existing drought forecasting and warning systems, strategies, monitoring equipment and facilities, disaster preparedness, procedures, manuals, and damage assessment techniques.
- (ii) Analyze the magnitude and frequency of droughts, prepare estimates of agricultural damage from droughts in the affected districts, and prepare risk scenarios.
- (iii) Analyze the adequacy and comprehensiveness of existing relief/rehabilitation management; and make recommendations for improving the system.
- (iv) Make recommendations for necessary actions to enhance preparedness and assist in integrating these measures into a national disaster mitigation and management action plan.

3. Flood Warning Systems and Damage Control Management

8. The consultants will do the following:

- (i) Review existing flood forecasting and warning systems, strategies, monitoring equipment and facilities, disaster preparedness, procedures, manuals, and damage assessment techniques.
- (ii) Analyze the magnitude and frequency of floods, prepare estimates of agricultural damage from floods in the affected districts, and prepare risk scenarios.
- (iii) Analyze the adequacy and comprehensiveness of existing relief/rehabilitation management; and make recommendations for improving the system.
- (iv) Make recommendations for necessary actions to enhance preparedness and assist in integrating these measures into a national disaster mitigation and management action plan.

4. Man-Made Social and Environmental Disasters

9. The consultants will do the following:

- (i) Assess the impact of a sudden inflow of returning refugees from neighboring countries imposed on the existing social infrastructure and environment.
- (ii) Analyze the adequacy and comprehensiveness of existing relief management.
- (iii) Make recommendations for necessary actions to enhance preparedness for man-made social and environmental disasters and assist in integrating these measures into a national disaster mitigation and management action plan.

COST ESTIMATES AND FINANCING PLAN
(\$)

Item	Foreign Exchange	Local Currency	Total Cost
A. Asian Development Bank Financing^a			
1. Consultants			
a. Remuneration and Per Diem			
i. International Consultants	80,000	18,000	98,000
ii. Domestic Consultants	0	86,000	86,000
b. International and Local Travel	24,000	4,800	28,800
c. Reports and Communications	4,000	1,000	5,000
2. Equipment	80,000	10,000	90,000
3. Awareness/Dissemination Workshops/ Regional Study Trips	72,000	23,400	95,400
4. Miscellaneous Administration and Support Costs	10,000	5,000	15,000
5. Contingencies	54,000	27,800	81,800
Subtotal (A)	324,000	176,000	500,000
B. Government Financing			
1. Office Accommodation and Facilities	0	10,000	10,000
2. Local Transportation	0	20,000	20,000
3. Counterpart Staff	0	20,000	20,000
Subtotal (B)	0	50,000	50,000
Total	324,000	226,000	550,000

^a Financed by the Technical Assistance Special Fund.
Source: Asian Development Bank estimates.