

Document of  
The World Bank

Report No: PAD1132

INTERNATIONAL DEVELOPMENT ASSOCIATION

RESTRUCTURING PAPER

ON A

PROPOSED PROJECT RESTRUCTURING

OF THE

AFGHANISTAN RURAL ACCESS PROJECT

APPROVED ON JUNE 26, 2012

AND

ADDITIONAL GRANT

IN THE AMOUNT OF US\$105 MILLION

FROM THE AFGHANISTAN RECONSTRUCTION TRUST FUND (ARTF)

TO

THE ISLAMIC REPUBLIC OF AFGHANISTAN

MAY 19, 2017

Transport & ICT Global Practice  
South Asia Region

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## CURRENCY EQUIVALENTS

(Exchange Rate Effective April 16, 2017)

Currency Unit	=	Afghan Afghani (AFN)
AFN 67.15	=	US\$1
US\$0.7362	=	SDR 1

## FISCAL YEAR

December 21 – December 20

## ABBREVIATIONS AND ACRONYMS

AASHTO	American Association of State Highway and Transportation Officials
ADT	Average Daily Traffic
AF	Additional Financing
AREDP	Afghanistan Rural Enterprise Development Program
ARTF	Afghanistan Reconstruction Trust Fund
ARAP	Afghanistan Rural Access Project
CBI	Cost per Beneficiary Index
CDC	Community Development Council
DRM	Disaster and Risk Management
EIRR	Economic Internal Rate of Return
ESMF	Environmental Safeguards Management Framework
GHG	Greenhouse Gas
GoIRA	Government of the Islamic Republic of Afghanistan
IC	Implementation Consultant
IDA	International Development Association
IFR	Interim Financial Report
IUFR	Interim Unaudited Financial Report
IRRD	Institute of Rural Reconstruction and Development
ISR	Implementation Status and Results Report
FM	Financial Management
MCIT	Ministry of Communications and Intelligent Technologies
MOF	Ministry of Finance
MPW	Ministry of Public Works
MRRD	Ministry of Rural Rehabilitation and Development
NCU	National Coordination Unit
NERAP	National Emergency Rural Access Project
NPV	Net Present Value
NRAP	National Rural Access Program
O&M	Operations and Maintenance
PDO	Project Development Objective
PIU	Project Implementing Unit
SDR	Special Drawing Rights
SME	Small and Medium Enterprise
TPM	Third-party Monitoring

TRRL	Transport and Road Research Laboratory, UK
UNOPS	United Nations Office for Project Services
UNESCO	United Nations Educational, Scientific, and Cultural Organization
USAID	U.S. Agency for International Development

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**AFGHANISTAN**  
**ADDITIONAL FINANCING TO AFGHANISTAN RURAL ACCESS PROJECT**

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**ADDITIONAL FINANCING DATA SHEET**

*Afghanistan*

*Additional financing for Afghanistan Rural Access Project (P149597 )*

**SOUTH ASIA**

**GTI05**

<b>Basic Information – Parent</b>				
Parent Project ID:	P125961	Original EA Category:	B - Partial Assessment	
Current Closing Date:	31-Mar-2018			
<b>Basic Information – Additional Financing (AF)</b>				
Project ID:	P149597	Additional Financing Type (from AUS):	Cost Overrun, Restructuring, Scale Up	
Regional Vice President:	Annette Dixon	Proposed EA Category:	B - Partial Assessment	
Country Director:	Shubham Chaudhuri	Expected Effectiveness Date:	15-Jun-2017	
Senior Global Practice Director:	Jose Luis Irigoyen	Expected Closing Date:	15-Mar-2020	
Practice Manager/Manager:	Olivier P. Le Ber	Report No:	PAD1132	
Team Leader(s):	Luquan Tian			
<b>Approval Authority</b>				
Approval Authority				
Board/AOB Decision				
Please explain				
The proposed Additional Financing (AF) requires a Level I restructuring due to: (a) the triggering of a new Safeguard Policy (OP 4.11, Physical Culture Heritage); and (b) a change in the Project Development Objective (PDO) (added language to accommodate the addition of an emergency response mechanism that is being added to the Project). Therefore, after approval of the AF by the Afghanistan Reconstruction Trust Fund (ARTF) Management Committee, the Project will be submitted to the Board for approval of the Level 1 Restructuring.				
<b>Borrower</b>				
Organization Name	Contact	Title	Telephone	Email
Ministry of Finance	Mr. Eklil Ahmad Hakimi	Minister	0093-700414324	
<b>Project Financing Data - Parent (Afghanistan Rural Access Project-P125961 ) (in USD Million)</b>				

Key Dates									
Project	Ln/Cr/TF	Status	Approval Date	Signing Date	Effectiveness Date	Original Closing Date	Revised Closing Date		
P125961	IDA-H7920	Effective	26-Jun-2012	22-Jul-2012	12-Aug-2012	31-Mar-2018	31-Mar-2018		
P125961	TF-13093	Effective	15-Sep-2012	15-Sep-2012	15-Sep-2012	31-Mar-2018	31-Mar-2018		
Disbursements									
Project	Ln/Cr/TF	Status	Currency	Original	Revised	Cancelled	Disbursed	Undisbursed	% Disbursed
P125961	IDA-H7920	Effective	USD	125.00	125.00	0.00	121.62	0.00	97.30
P125961	TF-13093	Effective	USD	207.00	207.00	0.00	158.72	48.28	76.68
Project Financing Data - Additional financing for Afghanistan Rural Access Project (P149597)(in USD Million)									
<input type="checkbox"/>	Loan	<input checked="" type="checkbox"/>	Grant	<input type="checkbox"/>	IDA Grant				
<input type="checkbox"/>	Credit	<input type="checkbox"/>	Guarantee	<input type="checkbox"/>	Other				
Total Project Cost:			155.00	Total Bank Financing:			0.00		
Financing Gap:			50.00						
Financing Source – Additional Financing (AF)							Amount		
BORROWER/RECIPIENT							0.00		
IDA Grant							0.00		
Afghanistan Reconstruction Trust Fund							105.00		
Financing Gap							50.00		
Total							105.00		
Policy Waivers									
Does the project depart from the CAS in content or in other significant respects?							No		
Explanation									
Does the project require any policy waiver(s)?							No		
Explanation									

<b>Team Composition</b>				
<b>Bank Staff</b>				
<b>Name</b>	<b>Role</b>	<b>Title</b>	<b>Specialization</b>	<b>Unit</b>
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Abdullah Noorzad	Team Member	Team Assistant	Admin	SACKB
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James Orehmie Monday	Team Member	Senior Environmental Engineer	Environmental Safeguards	GEN06
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Juan Carlos Alvarez	Counsel	Senior Counsel	Legal	LEGES
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Mohammad Asif Qurishi	Team Member	Program Assistant		SACKB
Mohammad Yasin Noori	Safeguards Specialist	Senior Social Development Specialist	Social Safeguards	GSU06
Mohammed Ajmal Askerzoy	Team Member	Transport Specialist	Road Engineering	GTI05

Obaidullah Hidayat	Safeguards Specialist	Environmental Specialist	Environmental Safeguards	GEN06	
Rachel S. Palmer	Team Member	Program Assistant	Project assistant	GTI06	
Tema Alawari Kio-Michael	Team Member	Team Assistant	Team assistant	GTI06	
Victor Ordonez	Team Member	Senior Finance Officer	Finance	WFALA	
<b>Extended Team</b>					
<b>Name</b>		<b>Title</b>	<b>Location</b>		
Virginia H. Jackson		Senior Operations Specialist	United States		
<b>Locations</b>					
<b>Country</b>	<b>First Administrative Division</b>	<b>Location</b>	<b>Planned</b>	<b>Actual</b>	<b>Comments</b>
Afghanistan	Kabul	Wilayat-e Kabul		X	
<b>Institutional Data</b>					
<b>Parent (Afghanistan Rural Access Project-P125961)</b>					
<b>Practice Area (Lead)</b>					
Transport & ICT					
<b>Contributing Practice Areas</b>					
<b>Additional financing for Afghanistan Rural Access Project ( P149597 )</b>					
<b>Practice Area (Lead)</b>					
Transport & ICT					
<b>Contributing Practice Areas</b>					
<b>Consultants (Will be disclosed in the Monthly Operational Summary)</b>					
Consultants Required? Consultants will be required					



## **I. Introduction**

1. This Project Paper seeks the approval of the Afghanistan Reconstruction Trust Fund (ARTF) Management Committee to provide an additional grant in the amount of US\$105 million to the Afghanistan Rural Access Project (ARAP) (P125961). The total estimated cost of the additional financing (AF) activities is US\$155 million<sup>1</sup>. In addition, a restructuring is being processed which would include: (i) a 23-month extension of the original Project closing date of the ARTF grant is sought, from March 31, 2018 to March 15, 2020; and (ii) addition of a fourth component “Contingency Emergency Response,” to enable a quick response to potential major natural and man-made disasters.

2. The Project Paper also seeks the approval of the Executive Directors for a Level One Restructuring that is required due to: (a) the triggering of a new Safeguards Policy (OP 4.11, Physical Culture Heritage); and (b) a change in the Project Development Objective (PDO), to include language to accommodate the addition of an emergency response mechanism to the project; and (c) a revision of two PDO indicators to include gender disaggregated data, and the additional beneficiaries resulting from the scale-up.

3. The proposed AF would help finance the costs associated with: (a) a US\$72 million financing gap which has resulted from the difference between the original cost estimates at the appraisal stage, and the revised costs from the detailed design (US\$69 million) largely because of an increased focus on climate resilience, and a financial loss due to IDA Special Drawing Rights (SDR) exchange rate fluctuations (US\$3 million); and (b) the scaling up of Project activities (US\$83 million) to increase the coverage of all-season road access, and to expand the rural road network coverage to increase other project co-benefits, especially job creation.

## **II. Background and Rationale for Additional Financing**

### **A. Performance of the Original Project**

4. The original grant for the ARAP in the amount of US\$332 million (IDA grant of US\$125 million, and an ARTF grant of US\$207 million) was approved on June 26, 2012, and became effective on August 12, 2012, with an original closing date of March 31, 2018. It is implemented jointly by the Ministry of Public Works (MPW) and the Ministry of Rural Rehabilitation and Development (MRRD).

5. The PDO is to enable rural communities to benefit from all-season road access to basic services and facilities. The project consists of three components:

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<sup>1</sup> While the total financing needs amount to US\$155 million, only US\$105 million is available at the moment. Therefore, there is a financing gap of US\$50 million which could be financed in the future if funding becomes available either through International Development Association (IDA) or the ARTF. This funding would be contingent on good project performance, and clarification from the Government on the tertiary road activities of the Citizen’s Charter Project.

- (a) Component A: Improvement and Maintenance of Secondary Roads (US\$186 million), which is implemented by the MPW;
- (b) Component B: Improvement and Maintenance of Tertiary Roads (US\$128 million), which is implemented by the MRRD; and
- (c) Component C: Program Planning and Development, Institutional Strengthening and Program Coordination Support (US\$18 million), which is jointly implemented by the MPW and MRRD and coordinated by a National Coordination Unit (NCU) within the Ministry of Finance (MOF).

6. **Implementation progress.** The implementation of the Project has been consistently rated as Satisfactory since the inception of implementation. The Project is implemented in 28 provinces in Afghanistan. Up to October 31, 2016, about 2,138 km of rural roads have been constructed or rehabilitated under the project. This enables about 5 percent more of the country's population to have 'all-season' accessibility, and has brought about 10 million employment-days through road construction and maintenance works. Tables 2.1 to 2.4 in Annex 2 show the overall project performance as described in the Implementation Status and Results Reports (ISRs), as well as the physical implementation progress through January 31, 2017. Total project disbursements from the IDA and ARTF grants as of February 28, 2017 are US\$121.62 million (97 percent) and US\$158.72 million (77 percent) respectively, which is fully in line with the original disbursement projections. The original project funding is fully committed through awarded and signed contracts for civil works, goods, and consultant services.

7. The proposed AF meets the eligibility criteria under OP 10.00: (a) the ISR ratings for progress toward Development Objectives and implementation progress over the most recent 12 months have been 'Satisfactory;' (b) the available data for the PDO-level indicators indicates that progress against set targets is on track; (c) there has been substantial compliance with the legal covenants, including audit and financial management (FM) reporting requirements; (d) the proposed AF is not expected to change environmental safeguards category; (e) the fiduciary ratings have been 'Satisfactory' for the last six months; and (f) the proposed AF activities are consistent with the original PDO and strategically aligned with the October 2016 Country Partnership Framework (CPF) <sup>2</sup> for Afghanistan. Legal covenants are complied with to date.

8. **Successful project management transition from the United Nations Office for Project Services (UNOPS).** At project effectiveness, UNOPS was hired by the Government as the Implementation Consultant (IC) to fill the essential skill gaps for project implementation, for example, project management and fiduciary management, including procurement and FM. The Government began the transition of assuming implementation responsibilities from UNOPS gradually during the early months of implementation, and within 18 months, the two line ministries had successfully taken over almost all project management, technical, and engineering and procurement responsibilities. On FM, there has been a gradual transfer of management responsibility from UNOPS to the Government agencies since the beginning of 2015. However, the reforms of the Government budget execution system in both line ministries and the MOF started off at a slow pace. At that time, the Government was burdened with managing large

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<sup>2</sup> FY2017–20, Country Partnership Framework (Report No. 108727-AF, Oct 2, 2016).

amounts of financial payments entering the Government financial system that was still developing. With the help of the World Bank, the two line ministries and the MOF have taken remedial measures which have resulted in a significant reduction of financial payment delays in the past six months.

## **B. Updates of Country Context and Sector Policy**

9. **Government ‘Jobs for Peace’ initiative.** High population growth and a youth bulge, with 400,000 entrants into the labor force each year, are presenting Afghanistan with an unprecedented job challenge. Unemployment and underemployment stand at about 22 percent and 46 percent, respectively, and have significantly increased over the past few years (up from 8.1 percent and 22.6 percent in 2011) because of stagnating growth and a deteriorating security environment. To counter the risks of the spreading insurgency and continued economic stagnation, in October 2015, the Government of the Islamic Republic of Afghanistan (GoIRA) proposed a ‘Jobs for Peace’ initiative aimed at stimulating aggregate demand and job creation. The initiative suggested several interventions, mainly anchored within the existing community-based mechanisms and consisting of public works, social housing, conditional cash transfers, and vouchers, which would require over US\$1 billion over the next 24 to 30 months. The Government recognizes the need to send a strong signal to the population to restore confidence in the National Unity Government. The initiative also recognizes that growth and service delivery and governance are the key to tackling the job crisis.

10. **Significant improvements of road network connectivity and accessibility have been achieved in the past decade.** All country provincial capitals and more than 97 percent of district centers (388 out of 398 district centers) have been accessible with four-wheel motor vehicles, except for two isolated areas (10 district centers), namely Wakhan Corridor of Badakshan and most of Nuristan Province, because of difficult terrain. Most of the country’s 45,000 villages are accessible via four-wheel vehicle roads except for about 4,800 villages that have no motor vehicle access.

11. **Sustainability of network improvement still remains challenging.** Besides the persistent challenges of network connectivity and accessibility, 49 percent of roads are still not serviceable throughout the year. Operations and Maintenance (O&M) has now come to the attention of the Government as an essential aspect of sustaining connectivity and accessibility. In addition, vehicle ownership has also increased exponentially over the past decade; hence, a significant proportion of unpaved secondary roads cannot cope with the heavy traffic (with Average Daily Traffic [ADT] above 500 vehicles per day) and need to be upgraded to a higher- standard paved road.

12. Moreover, traffic safety has brought attention to the public in the past few years. Substandard geometry and poor surface conditions contribute to most of the accidents on the rural road network. Increasing public awareness on road safety and improvements of technical capacity of road safety design need to become urgent government priorities.

13. Many development partners (including the World Bank, Asian Development Bank, U.S. Agency for International Development [USAID], U.K. Department for International Development, and German Agency for International Cooperation [*Deutsche Gesellschaft für Internationale Zusammenarbeit*]) are already providing large-scale technical and financial support

to the MPW, and others for building road asset management capacity to address this well-known and long-standing issue. The largest initiatives in this area are the following:

- (a) the USAID has recently approved nearly US\$100 million to support the MPW in institutional reform toward establishing a road authority, a road fund, and a transport institute. A portion of this fund will also be allocated to performance-based maintenance contracts for trunk highways through the Afghanistan Infrastructure Trust Fund;
- (b) the Asian Development Bank is funding a program piloting performance-based road maintenance executed by private firms on the Kabul-Jalalabad highway and has also provided funding to update the Road Sector Master Plan for Afghanistan.

14. The World Bank has been supporting rural roads development and maintenance for the last decade and has recently helped implement community-based routine maintenance on more than 4,000 km of secondary and tertiary roads through the parent project. The World Bank also provides support for O&M through the Incentive Program funded under the ARTF which is managed by the World Bank's governance team. As described elsewhere, the World Bank also supports the MPW through the ongoing Capacity Building for Results project to improve the civil service system capacity and by providing resources for the MPW so that it can hire well-qualified local staff into its regular civil service structure.

15. Citizens' Charter is a new compact between the Government and citizens to ensure citizen's development rights. The purpose of the Charter is to set a threshold of core services to be equitably provided to all communities, which will support the underserved poor who will receive a basic level of services to participate productively in the areas of economic growth. The Citizens' Charter intends to improve service delivery, provide greater responsiveness by the Government to the people, and increase the level of public satisfaction with services. Rural access is one of the basic-level services recognized in the Charter. Moreover, "realizing self-reliance" is another important Government vision set in the Charter to "restore security and political stability, root out corruption, achieve fiscal sustainability, support economic growth and job creation, and ensure citizens' rights to development."

16. **Road network services are vulnerable to climate change risks.** With increased frequency, flash floods, landslides, rock falls, and snow avalanches have been causing serious damage to road infrastructure in Afghanistan, as well as causing damage to or loss of properties and human lives. The Government is struggling to deal with the adverse impacts of climate change. The World Bank's Disaster and Risk Management (DRM) team is working with the Government on a comprehensive DRM system which has a special focus on the analysis of natural disaster impacts on transport infrastructure. Within the transport sector, the country has carried out reviews on various road design standards in the past five years and has now decided to adopt the American Association of State Highway and Transportation Officials (AASHTO) Standards. While the network planning study is still ongoing, it has acknowledged an immediate need to carry out a vulnerability assessment of the all-season connectivity of major highways and secondary roads to provide a foundation for developing and executing climate resilient measures for the most vulnerable road sections to ensure the basic road connectivity. Moreover, engineering measures, for example, improvements of slope protection and road pavement condition improvements from unpaved to paved also enhance the

climate change resilience of road infrastructure. Incorporation of such climate resilience related considerations are key drivers of the cost overrun relative to original appraisal estimates.

17. Afghanistan is a country of frequent natural disasters, and road infrastructure is not only vulnerable to the disasters but also plays an important role in disaster prevention and relief. Immediate financing needs are always the bottlenecks during or after disasters in low income settings. The World Bank has provided mechanisms to allow the government to quickly access a portion of their undisbursed project balances in case of emergency situations to address immediate post -crisis financing needs. This can be done through inclusion of contingency emergency response components.

18. **The transport sector is one of the major contributors to job creation.** Road construction and maintenance directly create a large number of jobs for low-skilled workers in the project areas. In Afghanistan, about 25 to 30 percent of road construction costs are for labor, and about 80 percent of the labor costs are for unskilled or low-skilled labor who are hired locally in the area of the road services. Moreover, rural roads generate job opportunities in both upstream and downstream value chains related to the road construction and maintenance, such as transportation, production, and supply of agricultural produce, and supply of other materials such as crushed stone and stone for masonry.

19. **Previous experience and lessons have been incorporated in the proposed Additional Finance.** Rural roads projects have been used by the Government as a job creation measure. In 2001–02, the National Rural Access Program (NRAP), previously known as the National Emergency Employment Program, was conceived as an employment provision scheme with a view to creating stability and providing the transition government with visibility among the Afghan population. Experience and recommendations from the previous operations include the following:

- (a) Improvements in network planning to target national economic development needs;
- (b) Unlocking bottlenecks to involve the private sector (especially small and medium enterprises [SMEs]) and communities in O&M, especially major roads' O&M; and
- (c) Improving transport service from connecting roads to storage facilities, and loading areas in the agriculture value chain to facilitate job creation outside the transport sector.

### **C. Rationale for Additional Financing**

20. The rationale for the AF is twofold: (a) first, to enable completion of rural roads rehabilitation as planned under the original ARAP, thus ensuring greater likelihood of achieving the original PDO and (b) second, to scale up the ARAP activities and extend the network coverage to increase all-season accessibility to a larger portion of the rural population, including scaling up of other co-benefits, especially job creation. The original Project expected to rehabilitate 2,550 km of rural roads; however, assessments over the past year lowered this projection because of higher than anticipated costs; thus, the original allocation could only support about 2,130 km under the original Project. The remaining 420 km is therefore proposed to be financed under the AF. The GoIRA is strongly committed to expanding the all-season road network (about 400 km more roads with more than 150 km paved asphalt roads) to further improve access to quality roads in the rural

areas. The AF will directly create 4.6 million employment-days, and indirectly bring more jobs for construction material supply and transport savings of agriculture products. Except for a new component, Contingency Emergency Response, the other activities to be supported by the AF will remain the same as those of the parent project, namely labor-intensive construction and maintenance works, and essential institutional capacity-building components. The institutional arrangements would remain unchanged as they have been effective during the implementation of the current project. The MPW and the MRRD will continue to be responsible for the implementation of all the project activities.

21. Overall, this AF, which has the support of the GoIRA, is well suited to maximize development impact and results as it will be able to utilize the existing and well performing ARAP implementation and institutional arrangements to maximize outcomes, while at the same time bringing additional funds, which would be particularly important in view of the rural roads access and job creation agenda. Alternatively, a new operation, or repeater project, or even a non-lending instrument would be less efficient, adding additional time, cost and other complications, and would not deliver any additional substantive benefits. The activities financed under the AF will complement and be implemented in parallel with the ongoing project. The IDA grant closing date, March 31, 2018, is not expected to change, while the closing date for the AF activities, which are under the ARTF portion of the financing, will be March 15, 2020. These arrangements are deemed sufficient to complete both the original ARAP and the AF activities.

22. The proposed AF activities are strategically aligned and consistent with the strategic objectives of the CPF for Afghanistan which aims to: (a) build strong and accountable institutions; (b) support inclusive growth; and (c) expand and deepen social inclusion. The proposed AF would contribute to these objectives by assisting the Government to enhance its institutional capacity to increase the opportunities of people to access, in an equitable way, economic opportunities and rural services. Most importantly, with a built-in job-oriented approach, the AF will not only focus on creating jobs inside the transport sector but will also leverage further opportunities for other rural sectors such as agriculture, and private sector development.

### III. Proposed Changes

#### **Summary of Proposed Changes**

The proposed AF would help finance the costs associated with: (a) a US\$72 million financing gap resulting from the difference between the original cost estimates at the appraisal stage, and the revised costs from the detailed design (US\$69 million), and a financial loss due to IDA SDR exchange rate fluctuations (US\$3 million); and (b) the scaling up of project activities (US\$83 million) to increase the coverage of all-season road access (with 400 km more), and to increase other project co-benefits, especially job creation.

In addition, a Level One Restructuring is being processed that is required due to: (a) the triggering of a new Safeguard Policy (OP 4.11, Physical Culture Heritage); (b) a change in the PDO (added language to accommodate the addition of an emergency response mechanism that is being added to the project); (c) revision of two Project Development Objective (PDO) indicators relating to gender disaggregated data and increased beneficiaries resulting from the scale-up; (d) addition of a fourth component, "Contingency

Emergency Response,” to enable a quick response to potential major natural and man-made disasters; and (e) an extension of the original ARTF grant closing date from March 31, 2018 to March 15, 2020.

Change in Implementing Agency	Yes [ ] No [ X ]
Change in Project's Development Objectives	Yes [ X ] No [ ]
Change in Results Framework	Yes [ X ] No [ ]
Change in Safeguard Policies Triggered	Yes [ X ] No [ ]
Change of EA category	Yes [ ] No [ X ]
Other Changes to Safeguards	Yes [ ] No [ X ]
Change in Legal Covenants	Yes [ ] No [ X ]
Change in Loan Closing Date(s)	Yes [ X ] No [ ]
Cancellations Proposed	Yes [ ] No [ X ]
Change in Disbursement Arrangements	Yes [ ] No [ X ]
Reallocation between Disbursement Categories	Yes [ ] No [ X ]
Change in Disbursement Estimates	Yes [ X ] No [ ]
Change to Components and Cost	Yes [ X ] No [ ]
Change in Institutional Arrangements	Yes [ ] No [ X ]
Change in Financial Management	Yes [ ] No [ X ]
Change in Procurement	Yes [ ] No [ X ]
Change in Implementation Schedule	Yes [ X ] No [ ]
Other Change(s)	Yes [ X ] No [ ]

### Development Objective/Results

#### **Project's Development Objectives**

##### Original PDO

The project development objective is to enable rural communities to benefit from all-season road access to basic services and facilities.

#### **Change in Project's Development Objectives**

##### Explanation:

The main substance of the PDO is unchanged; however, language has been added to accommodate the addition of an emergency response mechanism that is being added to the project as a new fourth component. The component will allow a quick response to potential major natural and man-made disasters. No cost is allocated as the mechanism is contingency -based and will only be required under circumstances that meet predetermined criteria.

##### Proposed New PDO - Additional Financing (AF)

The PDO is to enable: (a) rural communities to benefit from all-season road access to basic services and facilities, and (b) an early emergency response in the event of an eligible crisis or emergency.

### **Change in Results Framework**

Explanation:

The Results Framework would be modified to reflect the significant additional scope of work from the AF grant. The modifications would include the following:

1. Refinements in data reporting of two PDO indicators, specifically: (i) addition of gender-disaggregated data for “Increased frequency of trips to the nearest essential services (including town markets, schools, and health facilities) connected by the roads improved under the project” and (ii) amendments to the end targets of “Share of rural population with access to an all-season road” to capture the increase in the number of beneficiaries as a result of the scaled-up activities;
2. Addition of two intermediate indicators for job creation, namely: (i) job opportunities created via the intervention, in labor-days, and (ii) number of people trained and retrained with breakdown by gender;
3. Deletion of one intermediate indicator, “Road sector organizational study prepared,” due to the study being funded by another donor.
4. Adjustments of the end targets for a few intermediate output indicators in line with the scaled-up works of this AF.

The proposed changes to the indicators are detailed in the Results Framework in Annex 1.

## **Compliance**

### **Change in Safeguard Policies Triggered**

Explanation:

OP/BP 4.11 Physical Cultural Resources is triggered.

Bamiyan Valley is rich in cultural heritage resources. Currently, there is heavy major highway traffic across and/or close to seven heritage sites. Area-wide traffic management measures to divert the heavy traffic out of and away from the sites will be developed based on the Culture Heritage Protection Management Plan and urban planning of Bamiyan City developed by the Ministry of Culture, the Ministry of Urban Development and Administration, and the United Nations Educational, Scientific, and Cultural Organization (UNESCO). Site access facilities, including small car parking facilities (located on government land and out of potential vision intrusion areas); pedestrian access paths (strictly within right-of-way of original highways/roads); and service ducts/pipes underneath roads, including water supply and drainage and telecom (subject to the approval of the Ministry of Culture and UNESCO) are to be provided to support the tourist and roadside markets.

To facilitate the changes resulting from the triggering of OP/BP 4.11:

(a) Review and revision of the Environmental Safeguards Management Framework (ESMF) was completed by June 15, 2016; and

(b) Terms of reference of the Culture Heritage Protection Management Plan have been developed and incorporated in the revised ESMF. A full version of the Culture Heritage Protection Management Plan is to be developed during the implementation stage when the final alignment of access roads has been decided.



<b>Current and Proposed Safeguard Policies Triggered:</b>	<b>Current (from Current Parent ISDS)</b>	<b>Proposed (from Additional Financing ISDS)</b>
Environmental Assessment (OP) (BP 4.01)	Yes	Yes
Natural Habitats (OP) (BP 4.04)	Yes	Yes
Forests (OP) (BP 4.36)	No	No
Pest Management (OP 4.09)	No	No
Physical Cultural Resources (OP) (BP 4.11)	No	Yes
Indigenous Peoples (OP) (BP 4.10)	No	No
Involuntary Resettlement (OP) (BP 4.12)	Yes	Yes
Safety of Dams (OP) (BP 4.37)	No	No
Projects on International Waterways (OP) (BP 7.50)	No	No
Projects in Disputed Areas (OP) (BP 7.60)	No	No

**Covenants - Additional Financing (Additional financing for Afghanistan Rural Access Project - P149597)**

<b>Source of Funds</b>	<b>Finance Agreement Reference</b>	<b>Description of Covenants</b>	<b>Date Due</b>	<b>Recurrent</b>	<b>Frequency</b>	<b>Action</b>
				<input type="checkbox"/>		

**Conditions**

<b>Source Of Fund</b>	<b>Name</b>	<b>Type</b>
<b>Description of Condition</b>		

**Risk**

<b>Risk Category</b>	<b>Rating (H, S, M, L)</b>
1. Political and Governance	High
2. Macroeconomic	Substantial
3. Sector Strategies and Policies	Substantial
4. Technical Design of Project or Program	Moderate
5. Institutional Capacity for Implementation and Sustainability	Substantial
6. Fiduciary	Substantial

7. Environment and Social		Substantial								
8. Stakeholders		Moderate								
9. Other		High								
OVERALL		High								
<b>Finance</b>										
<b>Loan Closing Date - Additional Financing (Additional financing for Afghanistan Rural Access Project - P149597)</b>										
<b>Source of Funds</b>		<b>Proposed Additional Financing Loan Closing Date</b>								
Afghanistan Reconstruction Trust Fund		15-Mar-2020								
<b>Loan Closing Date(s) - Parent (Afghanistan Rural Access Project - P125961)</b>										
Explanation: Additional activities are fully under the ARTF portion of the financing and using the same account number, TF013093.										
<b>Ln/Cr/TF</b>	<b>Status</b>	<b>Original Closing Date</b>	<b>Current Closing Date</b>	<b>Proposed Closing Date</b>	<b>Previous Closing Date(s)</b>					
IDA-H7920	Effective	31-Mar-2018	31-Mar-2018		31-Mar-2018					
TF-13093	Effective	31-Mar-2018	31-Mar-2018	15-Mar-2020						
<b>Change in Disbursement Estimates (including all sources of Financing)</b>										
Explanation: 1) In the parent project, about US\$61 million out of total US\$332 million is yet to be disbursed, with annual projections of US\$40 million in FY17, and US\$21 million in FY18. No extension is needed for the parent project on the IDA portion; 2) Currently, only US\$105 million is agreed to cover the cost overrun and limited scale up activities with Component A US\$82 million, Component B US\$15 million and Component C US\$ 8 million. This scenario is expected to have the annual projections of US\$20 million in FY17, US\$40 million in FY18, US\$40 million in FY 19 and US\$ 5 million in FY20; and 3) Additional US\$50 million to fill the financing gap is contingent upon availability of additional funds from International Development Association (IDA) or the ARTF, good project performance, and clarification from the Government on the tertiary road activities of the Citizens' Charter Afghanistan Project. Under this US\$155 million scenario, the AF is expected to be disbursed by February 28, 2020, with annual projections of US\$20 million in FY17, US\$45 million in FY18, US\$65 million in FY19, and US\$25 million in FY20.										
<b>Expected Disbursements (in USD Million) (including all Sources of Financing)</b>										
Fiscal Year	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
Annual	20.00	40.00	40.00	5.00	0.00	0.00	0.00	0.00	0.00	0.00
Cumulative	20.00	60.00	100.00	105.00	0.00	0.00	0.00	0.00	0.00	0.00
<b>Allocations - Additional Financing (Additional financing for Afghanistan Rural Access Project - P149597 )</b>										

Source of Fund	Currency	Category of Expenditure	Allocation	Disbursement %(Type Total)
			Proposed	Proposed
ARTF	USD	(1) Goods, civil works, non-consulting services, consulting services, training and incremental operating costs	105.00	100.00
		<b>Total:</b>	105.00	
IDAT	USD		0.00	0.00
		<b>Total:</b>	0.00	

### Components

#### Change to Components and Cost

Explanation:

The proposed AF would extend activities that already constitute the original project, and in addition, include a fourth component for Contingency Emergency Response.

**Component A: Improvement and Maintenance of Secondary Roads (US\$105 million, with US\$69 million to fill the financing gaps<sup>3</sup> and US\$36 million for scaling-up activities)**

#### (a) Road works

- (i) *Improvement of unpaved secondary roads:* The original project included 1,000 km gravel roads and has a US\$52 million cost overrun.
- (ii) *Upgrading of paved secondary roads to bituminous surface:* This subcomponent will cover the cost overrun of US\$20 million from the original project scope of 250 km. Besides the cost overrun, extra 100 km asphalt roads are to be rehabilitated with the costs of US\$25 million.
- (iii) *Construction of bridges on secondary roads:* This subcomponent includes a US\$1 million cost overrun for original 1,000 linear meter bridges. Additional 700 linear meter new bridges are to be constructed with additional US\$7 million to improve connectivity to isolated communities in remote areas.

The following activities included in the original project will be continued without any extra costs.

- (iv) *Periodic maintenance of unpaved secondary roads*
- (v) *Periodic maintenance of paved secondary roads*
- (vi) *Emergency maintenance of secondary roads*

Additional US\$4 million allocated for the subcomponents is to extend secondary road maintenance and to mainstream the maintenance practice setup in the parent project into the Government system. These include:

<sup>3</sup> The total of US\$ 69 million financial gaps include US\$73 million cost overrun on civil works but a US\$ 4 million savings from project management and implementation support activities. See also Table 2.5 in Annex 2.

- (vii) *Routine maintenance of paved and unpaved secondary roads to cover extra 500 km routine maintenance.*
- (viii) *Construction of maintenance camps at selected locations; and*
- (ix) *Provision of road maintenance equipment and road and traffic condition test devices.*

**(b) Project management and implementation support activities.** With about US\$4 million in savings from the original project budget reallocated to roadworks, the subcomponent will also include extra project management and implementation support activities resulting from the additional road works, for example, the site supervision of the project roads and consulting services of mainstreaming O&M practices into the Government system.

**Component B: Improvement and Maintenance of Tertiary Roads (US\$40 million scaling up of activities only)**

**(a) Road works**

- (i) *Rehabilitation of tertiary roads:* Extra 300 km of tertiary roads, with a cost of US\$34 million are to be constructed to extend the tertiary road network.
- (ii) *Construction of bridges on tertiary roads:* Additional 600 linear meter bridges are to be built to improve accessibility for remote villages with a cost of US\$4.5 million.

The following activities included in the original project will be continued without any extra costs.

- (iii) *Periodic maintenance of tertiary roads; and*
- (iv) *Emergency maintenance of tertiary roads.*

Additional US\$3 million is to sponsor tertiary road maintenance on:

- (v) *Routing maintenance of tertiary roads:* extra 1,800 km tertiary road maintenance; and
- (vi) *Provision of road maintenance equipment and road and traffic condition test devices to mainstream tertiary road maintenance into the Government system. The latter consists of procurement of machines or equipment for collection of road condition data and setting up of road inventory system.*

**(b) Project management and implementation support.** With about US\$1.5 million cost savings from the parent project budget reallocated to road works, the activities of the project will include extra project management and implementation support activities resulting from the additional tertiary road works, for example, the site supervision of the project roads and consulting services for mainstreaming O&M practices into the Government system.

**Component C: Program Planning and Development, Institutional Strengthening and Program Coordination Support (US\$10 million, with US\$3 million to cover the financial loss due to IDA SDR exchange rate changes and US\$7 million for scale-up activities)**

**(a) Setting up a rural roads planning and management system.** Additional US\$5 million is to sponsor MPW to carry out Kabul - Jalalabad - Torkham - Peshawar expressway feasibility study and local road network planning in the Kabul - Jalalabad - Torkham - Peshawar corridor.

**(b) Institutional strengthening and capacity building in the rural road sector.** Additional US\$ 2 million is to sponsor vocational training and other supports to technical capacities. The vocational training supports will sponsor the MPW and the MRRD to rent relevant classrooms and hire experienced trainers to provide technical trainings to local communities and practitioners from construction industries. Other supports will sponsor key sector studies for sector reform and Public-Private Partnerships and so on.

(c) **Program coordination support.** About US\$3 million is to address the financial loss of entire project as a result of IDA SDR exchange rate changes.

**Component D: Contingency Emergency Response (US\$0)**

This component will allow for a rapid response in the event of an adverse natural or man-made event that causes a major disaster through the reallocation of project funds. It could also be used to channel additional funds for emergency response should they become available.

<b>Current Component Name</b>	<b>Proposed Component Name</b>	<b>Current Cost (US\$M)</b>	<b>Proposed Cost (US\$M)</b>	<b>Action</b>
Component A - Improvement and maintenance of secondary roads	Component A - Improvement and maintenance of secondary roads	186.00	291.00	Revised
Component B - Improvement and maintenance of tertiary roads	Component B - Improvement and maintenance of tertiary roads	128.00	168.00	Revised
Component C- Program Planning and Development, Institutional Strengthening and Program Coordination Support	Component C- Program Planning and Development, Institutional Strengthening and Program Coordination Support	18.00	28.00	Revised
	Component D: Contingency Emergency Response	0.00	0.00	New
	<b>Total:</b>	332.00	487.00	

**Other Change(s)**

<b>Implementing Agency Name</b>	<b>Type</b>	<b>Action</b>

**Change in Implementation Schedule**

Explanation:

The AF is expected to close on March 15, 2020. With the original IDA closing date of March 31, 2018, remaining unchanged, the ARTF grant closing date will be extended to March 15, 2020. This arrangement enables the Project to complete the expanded scope of work under the AF.

**Other Change(s)**

Explanation:

### **Improvements of Payment Process**

The disbursement arrangements in the parent project included a UNOPS float account and the Government's own system. The float account arrangement, as a back-up to the Government payment system, significantly improved the efficiency of payments. As UNOPS gradually withdrew from the project implementation services, the Government system began to assume this role.

In the past six months, bottlenecks have been addressed in both line ministries and the MOF and a set of service standards are already established in both the MOF and the line ministries. There are no technical capacity issues with regard to the FM specialists in both line ministries and the MOF as the same FM specialists who had worked on the UNOPS team have been hired as the ministry staff and continue to work on the project.

Fiduciary performance will be assessed through monitoring of indicators, as follows: (a) timely processing of payment of invoices; (b) timely and quarterly submission of Interim Financial Reports (IFRs); (c) maintenance of adequate record books and supporting documents of project transactions; (d) timely submission of audited financial statements; and (e) timely resolution of FM issues raised during World Bank supervision, internal audit, external audit, and any other reviews that may become necessary.

The World Bank will carry out two FM reviews annually, one of which will be a detailed field review, including a transaction review of project expenditures on a sample basis. The implementation support will include monitoring of fiduciary performance based on identified indicators, review of IFRs and audit reports; review of compliance with legal covenants; review of progress on agreed actions; and review of FM risks.

## **IV. Appraisal Summary**

### **Economic and Financial Analysis**

Explanation:

The AF has the same economic rationale as the original project. An economic analysis has been undertaken using the same methodology as defined in the parent project to maintain consistency. Overall, the AF targets both the cost overrun of secondary roads and scale-up for both secondary and tertiary roads. The economic analysis results are summarized here.

#### **Cost Overrun**

Secondary paved and unpaved road experienced a cost overrun at the implementation stage of the parent project.

**Reasons for cost overrun of secondary roads.** The cost overruns largely result from an enhanced focus on climate resilience and its implications for additional modifications to the works. These overruns became apparent once the site-survey data become available. It was not possible to acquire this data during preparation because of site accessibility and security issues, and thus the cost estimations were based on an assumption that the key intervention in all project roads would be rehabilitation. However, during the implementation when the site survey data became available, the following became clear:

- (a) It was found that a significant proportion of the road alignments have to be diverted from the original routes to new routes because of over-stretched slopes and vulnerability to hydraulic conditions in the original alignments.
- (b) Because of sustainability considerations, more slope protections and drainage structures have been designed than those in the preceding National Emergency Rural Access Project (NERAP). This comes from the lessons learned from the recommendations of the World Bank NERAP Third-party

Monitoring (TPM) reports. Such increased slope protections and drainage structures also contribute to the cost upsurge.

- (c) Design standards changed from the British to AASHTO (U.S.) Standards system. This resulted in considerable changes in asphalt pavement thickness (from 5 cm single layer before up to 9 cm to 11 cm dual layers). Correspondingly, the cost of pavement construction more than doubled.

**Economic analysis for cost overrun.** Using revised costs (estimated based on detailed design), the roads selected in the parent project have been reevaluated: paved secondary roads evaluated using Net Present Value (NPV) and Economic Internal Rate of Return (EIRR) and unpaved secondary roads evaluated using Cost per Beneficiary Index (CBI). The economic analysis has found the following:

- (a) *Unpaved secondary roads:* Because of the cost overrun, only 621 km of the original 1,000 km have been invested in. For these 621 km, the overall CBI increased 1.64 times, from US\$73 per beneficiary to US\$120 per beneficiary (a 64 percent increase). The remaining 387 km will be upgraded using the AF. For these roads, the CBI has increased from US\$87 per beneficiary to US\$240 per beneficiary. This is still relatively low by international rural road practices, for example, a threshold of US\$490 per beneficiary set for a World Bank-financed project in Morocco.
- (b) *Paved secondary roads:* Overall, the NPV for these roads has decreased by 13.6 percent from US\$213 million to US\$184 million. However, despite a cost overrun, the EIRR for all road sections is at least 18.3 percent, which is well above the 12 percent threshold. Thus, investment in these roads is still economically viable.

#### **Scale-up of secondary and tertiary road construction and rehabilitation activities**

- (a) *Unpaved secondary roads:* During implementation, some selected project roads have been taken by other donors or the Government's own funds; therefore, the road connecting two districts in Wakhan Corridor on the priority list will be included in the AF as a substitution. For this reason, the economic analysis of the road is reflected as a 'new' road although it was selected in the original 1,000 km scope. The CBI of the proposed 30 km unpaved road in Wakhan Corridor is US\$510 per beneficiary; this figure is slightly higher than those of roads located in normal places. However, the road has been selected based on the principles established in the parent project and the CBI is not the only indicator for selection. Technical analysis shows that the road is located in the difficult terrain of one of the world's highest mountains and other road alignment options are not possible.
- (b) *Paved secondary roads:* Using the same process (as the parent project), an additional 100 km of new secondary roads have been identified for paving. At a 12 percent discount rate, the NPV of these roads is estimated to be US\$92.5 million (of these, US\$2.4 million stem from greenhouse gas [GHG] emissions reduction). The minimum EIRR for any road section is 28.6 percent (well above the 12 percent threshold).
- (c) *Tertiary roads (both unpaved and paved):* Newly proposed tertiary roads were selected (longlisted) by largely following the same methodologies used in the parent project. Access of farms to markets was added to the selection criteria. For the unpaved tertiary roads, the average CBI is US\$62 per beneficiary. For the pavement construction of tertiary roads, the average CBI is US\$44 per beneficiary. In addition to the calculations of CBI, the roads located in the areas which produce some of the country's celebrated agriculture products and to be used to transport fruits, vegetables, and fragile porcelain products will be given the highest priority.

The AF will also provide the following non-quantifiable co-benefits:

**1. Rural access as a citizen right.** Most of the AF activities, namely secondary road network extension and accessibility improvements (tertiary roads), cover the country's two most isolated areas and fill the final gaps of four-wheel drivable connectivity of the country's road network. Paving the roads that have

large traffic volume and improving transport services to rural SMEs would also generate an array of benefits to the affected populations, including improved access to markets, reduction in travel times, reduction in vehicle operating costs, improved access to health and education facilities, and employment creation through the start-up and expansion of businesses that will likely result because of the economic stimulus provided by the improved roads.

**2. High-level socioeconomic benefits.** Bamiyan Valley has acute challenges in balancing land use for local economic development and protection of world famous cultural heritage sites. The proposed Bamiyan Valley traffic calming measures, including traffic diversion from heritage sites and access roads to the sites, are an important part of the Bamiyan Valley UNESCO Cultural Heritage Improvement Plan. Such measures will divert vehicle traffic away from the cultural protection sites and have potentially important direct benefits to improve the outstanding universal value of the Bamiyan Buddha sites. Furthermore, such traffic calming measures with special pavements matching the surrounding environment will contribute to the substantial improvement of business opportunities for the local population. Bamiyan remains an attraction for both domestic and foreign tourists. Based on the statistics of the Bamiyan Buddha Administration Office, the substantial number of domestic tourists can be expected to be sustainable and potentially increase in the coming years. Such traffic calming measures are expected to bring significant benefits to the local economy.

## Technical Analysis

### Explanation:

In general, the proposed AF would: (a) ensure that the project can achieve its original PDO; and (b) scale up road construction and maintenance activities to support the Government's 'Jobs for Peace' initiative.

(a) The AF is needed first and foremost to cover the financing gap of the project. Without closing the financing gap, which is estimated at US\$69 million or 21 percent of the original project funding amount, the planned physical project outputs cannot be fully achieved and the original PDO indicator— Share of rural population with access to an all-season road—can only be partially achieved. Furthermore, the financial gap comes from the secondary road network, which is critical for network coverage improvements as well as for providing more equitable access to the job market and services.

(b) The AF also focuses on enhancing network connectivity by filling the network's basic connectivity gaps with unpaved roads and upgrading large traffic volume roads to paved standards to sustain proper service levels. The former efforts mainly focused on extending the secondary network in Wakhan Corridor and Nuristan Province, while the AF is focused on two, selected large-volume secondary corridors— Panjab (Bamiyan Province) and Nillie (Daykondy Province). The two gaps and two large-volume corridors are selected based on the latest network transport planning study which was carried out in the parent project.

(c) The AF will also support the selection of areas famous for their agriculture products and special areas for rural development and will work with micro, small, and medium enterprises to raise their productivity and create more job opportunities. The selected agriculture products and development areas, namely fruit products and the Bamiyan Valley and Kabul Province porcelain products, are sensitive to transport services. Accessibility and transport services are identified as bottlenecks in the product value chains. Moreover, under the project bridge construction, optimizing the design of combining with the mini-hydro option will also be investigated to provide complementary benefits to the local population and achieve fiscal sustainability of asset management. Working with the ongoing Afghanistan Rural Enterprise Development Program (AREDP) and other rural enterprise promotion projects, the AF will provide support to explore new mechanisms for the beneficiary enterprises in the road O&M.

(d) Building on community-based O&M and the successful survey of road assets in the parent project, the AF will extend O&M support to the line ministries. The MPW is responsible for the country's national



highways and secondary road networks, and the MRRD is the rural infrastructure and service facilitator for villagers. O&M support to the MPW is therefore focused on improving the capacity of selected provincial departments and lowering the barriers to involving micro and small rural enterprises in O&M, while support to the MRRD is focused on assisting provincial departments in setting up a tertiary road inventory system and supervising Community Development Councils (CDCs) and beneficiary enterprises on O&M.

(e) It has become apparent that the road construction market faces a shortage of skilled labor, which negatively affects the 'Jobs for Peace' efforts and also affects the quality of road works. The AF will also support the MPW in enhancing its vocational training program for road professionals while supporting the MRRD and its Institute of Rural Reconstruction and Development (IRRD) as a means of providing skills training to the villagers living in the project road areas.

(f) The AF will provide other technical support, for example, support to commercialization of project implementation services. Having seen the significant improvements in the implementation capacity of line ministries, the commercialization policy would further strengthen the consulting market, open up the consulting market for private firms, and improve the resilience of service delivery capacity. Efforts of government policy research, the Road Authority Reform Plan prepared by the MPW and research seminars on international experiences, are to be sponsored.

(g) *Third-party Monitoring (TPM)* continues to be deployed and enhanced in project implementation and will continue to: (i) provide critical data from the field as input to the World Bank's implementation support; (ii) assist the World Bank team providing assurance to the ARTF donors and a level of additional evidence that programs are being implemented as designed; and (iii) help the implementing agencies strengthen their own monitoring programs. Moreover, the line ministries have set up a coordination mechanism with the TPM consultant to improve the quality of project implementation.

(h) *Road Safety.* Under the circumstance of extreme weak capacity, improvements of road safety design capacity is a fundamental step towards future comprehensive interventions on traffic safety agenda. Capacity building activities on road safety will raise up awareness of the public and sector professionals and also to assist the government to adopt the up to date technical standards in rural road network improvement.

## **Social Analysis**

### **Explanation:**

This AF maximizes social benefits, especially jobs creation, given that the country is facing various socioeconomic development challenges, including 200,000 new job-seekers coming into the job market every year.

Neither the parent project nor the AF activities are undertaking financing of any form of extensive land acquisition and will cause no restriction of access to sources of livelihoods. This is because all physical activities are being carried out within the existing right-of-way or on government lands. Based on the experience of the previously completed subprojects of the parent ARAP, there is a very low probability that minor readjustments in road improvement such as adding curves or width will require small parcels of land. To mitigate the potential social or economic impacts of any such minor land acquisitions or related impacts, an Abbreviated Resettlement Framework of the original ARAP was updated by the Project Implementing Units (PIUs) at the MPW and the MRRD to guide preparation of an Abbreviated Resettlement Action Plan (where needed). Overall, the potential social impacts of the project investments are expected to be of a small scale and site specific, and thus, easily remedied. Any project-related social or economic displacement will be handled through the Abbreviated Resettlement Action Plans (if needed).

*Gender development.* Building on gender mainstreaming practices and achievements in the parent project so far, the AF will continue and further strengthen involvement of women in the project at all stages, from

community mobilization and consultation to implementation and capacity-building activities. Particular attention will be paid to female project affected people. The AF will take measures, including having female staff at the field level, to facilitate proper consultation with female community members, ensuring their voice is captured and their demands are met to the extent possible. On job creation, generally, construction and maintenance works involve heavy labor and the nature of the work makes involvement of women difficult in the context of Afghan culture. Nonetheless, the AF will continue to support and encourage women's participation in labor as well. Under the parent project, a Gender Development Manual has been developed, and the AF intervention will mainstream the manual into project activities. Women's income generation measures, like participation in the construction and maintenance, gabion weaving, and laundry services at construction sites, will be further promoted. Provision of more vocational training opportunities to women are also being promoted and monitored under the parent project and will continue to be supported under the AF.

*Citizen engagement.* The project begins its engagement with local communities during the design and implementation stage, and carries out consultations with different stakeholders at the local level. The highest priority is given to vulnerable groups, especially women and the landless, to ensure that these groups are fully aware of the proposed work and its potential impacts. Moreover, less technically sophisticated construction and most of road maintenance works are also to be carried out by local communities. Building on the success of the parent project, the Grievance Redress Mechanism will be strengthened to promote feedback and ensure transparency and accountability. The PIUs will ensure that the affected communities have a full understanding of the Grievance Redress Mechanism and ways to access it.

*Labor Influx.* While the AF activities include labor intensive construction and maintenance works, labor influx related risks are classified as “Low”. A total of 176 road-sub-projects will be procured under the AF; and all of them are tendered using post-reviewed National Competitive Bidding (NCB) contracts or local community contracts. Due to the small size of the contracts and the low level of technical sophistication of the works, labor is seldom hired outside local communities and even contractors are rarely from other provinces. Therefore, there is no issue of absorption capacity related to local communities; and due to economic and security reasons, there is no chance of hiring external workers from other provinces or foreign countries. Moreover, some road sections are now under design and might have the probability to use NCB prior review contracts to construct the sections. In such case, site specific ESMPs are to be enhanced by incorporating labor influx issues under the guideline provided in Annex 2. In summary, the labor influx impacts from the AF activities can be managed through ESMP. Detailed analysis can be found in Annex 02.

**Environmental Analysis**

Explanation:

The AF activities are a scale-up of the activities under the parent project, with no technically sophisticated activities added to the project. As such, the AF will maintain the same Environmental Category B.

All policies triggered from the parent project will be applicable to the AF. An additional safeguards policy OP/BP 4.11, Physical Cultural Resources, is being triggered under the AF because one of the subcomponents is focused on Accessibility Improvements in Bamiyan Valley. This improvement is to divert motor traffic out of the cultural heritage sites and to improve the access road surfaces using local traditional materials. The proposed works will significantly improve the cultural heritage outstanding universal value and will not cause any major irreversible long-term impact. Given that only the traditional construction methods are allowed during the construction stage, there is very little possibility of any irreversible damage to the cultural heritage sites. The ESMF is revised to reflect the needs of OP/BP 4.11, and all major stakeholders—the local government, the Ministry of Culture, and the UNESCO—have also

been consulted and will proceed, based on the same principles and key actions in the ESMF, over the planning, design, and construction stages.

## **Risk**

Explanation:

*Overall: High*

The risks identified in the parent project have been reassessed. The Systematic Operations Risk-Rating Tool assesses the overall rating of the ARAP and the AF as High because of overall substantial political, governance, macroeconomic, and fiduciary risks. The security situation at most project sites has significantly deteriorated since the start of the project. Most of the other risk ratings remain the same as under the parent project.

### **High Risks**

*Political and Governance: High*

There is a high risk to the PDO stemming from Afghanistan's overall political situation and governance context. The serious security issues prevailing in the country will most likely affect project implementation. The high degree of political instability, fragility, uncertainty, or transition could also derail project implementation.

*Other: High*

There are site-specific security risks directly related to the project implementation with regard to cost and duration. Although such risks are generally beyond the control of the World Bank and the client, some less technically sophisticated gravel roads can be constructed via community-based contracts to mitigate these risks. The mitigation measures have been successful in the previous World Bank-financed NERAP, for instance, the use of community contracts and local communities to carry out road works if contractors are unwilling to undertake contracts in insecure areas. However, such mitigation measures also rely on many external factors.

### **Substantial Risks**

*Fiduciary management: Substantial*

In the earlier stage of project implementation, the Government's fiduciary management systems (FM and procurement) were found to be deficient, leading to delays in procurement and payments. Payments typically took between 40 and 60 days, often much longer, instead of the 28 days stipulated in most contracts. Until the end of March 2016, UNOPS was helping the Government sort out the payment issues and gradually transferred all FM responsibilities to the Government. The Government has been struggling to takeover full FM responsibilities during the past 10 months. The Government and the World Bank have been working together (beyond the scope of this project) to simplify payment procedures and bring about essential reforms inside the Government system. Through the recent simplification and reform measures, the payment delays have been significantly reduced, although yet to reach the 28-day threshold stipulated in a few contracts. The fiduciary risk is therefore rated as Substantial.

*Macroeconomic: Substantial*

The project does not require large-scale funding from the Government, but it is a general trend that the international donors' contributions to Afghanistan are shrinking. This causes a substantial risk that macroeconomic issues could affect project implementation, especially since the project will be funded mostly by a multi-donor trust fund, the ARTF, and the Government might have to reallocate any available funds to other urgent purposes should there be any extreme budget constraints.

*Sector Strategies and Policies: Substantial*

This relates essentially to the Government's strategy and policy for road management and maintenance which have been described earlier in the parent project's Project Appraisal Document. While there is a low risk that the existing issues will affect the implementation of the project, there is a substantial risk for the medium- and long-term sustainability of the road infrastructure built through the project despite the numerous ongoing efforts by many parties (including the World Bank) to improve road management and maintenance.

*Institutional Capacity for Implementation and Sustainability: Substantial*

The project has been implemented through two PIUs, coordinated by the NCU and led and directed by a Steering Committee (formed by the MPW/MRRD/MOF). The progress of the past few years shows the implementation mechanism's competence and efficiency. However, there is a substantial risk related to the 'Change Management' initiative, recently introduced to the ministry by the MRRD. The purpose of change management is to realize the 'self-reliance' of government institutions for the civil service staff to fully take on the project management responsibilities. At the project level, the MRRD changed the PIU from a 'project organizational structure' to a more balanced 'matrix organizational structure'. Such changes have the advantages of utilizing the limited resources and technical capacities and sharing them throughout the ministry. But they also have some disadvantages with regard to lack of effective coordination in the management of the allocated resources. This is one reason for the Substantial risk rating for the project. Having recognized this, the Steering Committee has decided that, while improving the civil service team's capacity, the PIU staff will remain intact and not be changed so that their expertise and capacity can be fully utilized throughout the project implementation. On the other hand, enhanced project management measures, for example, detailed performance management measures in the Financial Management Manual, to improve the coordination of resources management, are already in place.

*Environment and Social: Substantial*

The additional risk in the AF is related to the sensitivity of cultural heritage protection issues in Bamiyan Valley. OP/BP 4.11 is triggered with the AF. However, the intervention is to divert traffic away from the cultural heritage sites, thereby improving the cultural environment of the protected area. Engineering options available make it impossible for any heavy machinery to be used at the sites and only very limited labor-intensive brick or stone pinch pavements for pedestrian movements can be laid. The possibility of damaging the cultural heritage assets is minimal and the risk is Low. Moreover, the AF activities are a scale-up of the activities under the parent project. The safeguard-related risks and mitigation measures identified in the parent project are essentially the same. Hence, taking into account the above two aspects, the safeguard risks are rated as Substantial.

**Moderate and Low Risks**

*Technical Design of Project or Program: Moderate*

There is only a moderate risk that the existing technical design (and the updates yet to be done) would be of insufficient quality. This risk is mitigated through the review of the design by the World Bank staff and other technical specialists. Also, the Project Leadership Committee has introduced a competition mechanism to improve the delivery efficiency of the two PIUs. This is also expected to result in improved design products.

*Stakeholders: Moderate*

At the present time, the project is universally supported by all key stakeholders at the national level because of its clear and obvious importance for Afghanistan. At the local level, there is also strong support for the project. There is, however, a risk that the local insurgent forces who have always expressed support for any road building works may change their attitude later because of broader political concerns. This risk

is mitigated by the implementation strategy to be applied, including community-based contracting, which has been designed to generate local support as much as possible. The remaining risk is rated Moderate. The mitigation measures have been found successful in both the parent project and the preceding NERAP.

### **Climate Change and Disaster Risks**

In compliance with IDA17 priority commitments, this AF has been screened to identify and, if relevant, address any potential short- and long-term climate change and disaster risks. The risk screening suggests an overall Moderate risk rating for the project outcome. Therefore, climate change and disaster hazards may pose moderate risk to achievement of the PDO defined for this operation. The potential impact on the physical components because of exposure from hazards is modulated by the project's nonphysical components.

As a result of this screening, these additional activities are proposed in the AF: (a) the client will explore another technical assistance project with the World Bank's DRM team to carry out network service-level assessments and detailed assessments on critical roads of network so as to better understand the nature of the risks and mitigate them; (b) capacity-building measures in the project, including improvement of designs and essential trainings, could increase preparedness and longer-term resilience and reduce the project risks; (c) considering the emergency needs of the client, a Contingency Emergency Response Component has been included; a Contingency Emergency Response Component is a financing mechanism that helps the recipient country quickly access the project funds for emergency response and early recovery after an eligible crisis has occurred or is about to occur; and (d) finally, the AF will assist the client in improving the road design and construction standards and support the network planning study to further analyze all-season network connectivity of the country's major highways and secondary roads.

## **V. World Bank Grievance Redress**

23. Communities and individuals who believe that they are adversely affected by a World Bank (WB) supported project may submit complaints to existing project-level grievance redress mechanisms or the WB's Grievance Redress Service (GRS). The GRS ensures that complaints received are promptly reviewed in order to address project-related concerns. Project affected communities and individuals may submit their complaint to the WB's independent Inspection Panel which determines whether harm occurred, or could occur, as a result of WB non-compliance with its policies and procedures. Complaints may be submitted at any time after concerns have been brought directly to the World Bank's attention, and Bank Management has been given an opportunity to respond. For information on how to submit complaints to the World Bank's corporate Grievance Redress Service (GRS), please visit <http://www.worldbank.org/GRS>. For information on how to submit complaints to the World Bank Inspection Panel, please visit [www.inspectionpanel.org](http://www.inspectionpanel.org).

### Annex 1: Results Framework and Monitoring

Project Name:	Additional financing for Afghanistan Rural Access Project (P149597)	Project Stage:	Additional Financing	Status:	DRAFT
Team Leader(s):	Luquan Tian	Requesting Unit:	SACKB	Created by:	Mohammed Ajmal Askerzoy on 10-Aug-2014
Product Line:	Recipient Executed Activities	Responsible Unit:	GTI05	Modified by:	Luquan Tian on 06-Apr-2017
Country:	Afghanistan	Approval FY:	2017		
Region:	SOUTH ASIA	Lending Instrument:	Investment Project Financing		
Parent Project ID:	P125961	Parent Project Name:	Afghanistan Rural Access Project (P125961)		

#### Project Development Objectives

Original Project Development Objective - Parent:

The project development objective is to enable rural communities to benefit from all-season road access to basic services and facilities.

Proposed Project Development Objective - Additional Financing (AF):

The PDO is to enable (a) rural communities to benefit from all-season road access to basic services and facilities and (b) an early emergency response in the event of an eligible crisis or emergency.

#### Results

Core sector indicators are considered: Yes

Results reporting level: Project Level

#### Project Development Objective Indicators

Status	Indicator Name	Core	Unit of Measure		Baseline	Actual(Current)	End Target
Revised			Percentage	Value	0.00	0.00	30.00

	Percent reduction in travel time by a 4-wheel drive vehicle along roads improved under the project	<input type="checkbox"/>		Date	15-Dec-2012	30-Jun-2016	31-Mar-2020
				Comment	Baseline data were collected via video survey or user survey (in the original project).	No interim surveys have been carried out.	The end date is revised to reflect the additional roads to be built; while the 30% reduction target remain the same for all project roads.
Revised	Increased frequency of trips to nearest essential services (including town markets, schools, and health facilities) connected by the roads improved under the project	<input type="checkbox"/>	Percentage	Value	0.00		15.00
				Date	15-Dec-2012	30-Sep-2017	30-Sep-2019
				Comment	Base year survey was carried out in the original project, and the survey shows, that, in base year, 42% of males travel daily to/from district centers and 39% to/from provincial and other locations within the province (20% and 16% for females respectively).	No interim surveys have been carried out. Revision includes 1) 2 year extension of the end target date; and 2) Female segregated data	By the end of the project, 48% male travel daily to/from district centers and 45% to/from provincial and other location within the province. This 23% and 18% for female respectively (with 15% growth).
New			Percentage		0.00		15.00

	Female: Increased frequency of trips to nearest essential services (including town markets, schools, and health facilities) connected by the roads improved under the project	<input type="checkbox"/>	Sub Type Supplemental	Value			
Revised	Share of rural population with access to an all-season road	<input checked="" type="checkbox"/>	Percentage	Value	58.00	63.00	65.00
				Date	01-Oct-2012	30-Oct-2016	31-Mar-2020
				Comment	baseline survey shows that, all over the country, the percentage of rural population with all season access reached 58%	Project investment only. Roughly estimated based on GIS household data. (validation be needed in follow up survey)	65% is set in parent project; and via confirmed project investment US\$105m only given limited scale up. [Under Scenario \$155m, about 66.00% (about 230,000 more rural people) be connected.]
Revised	Number of rural people with access to an all-season road	<input checked="" type="checkbox"/>	Number Sub Type Supplemental	Value	13500000.00	14660000.00	15120000.00

### Intermediate Results Indicators

Status	Indicator Name	Core	Unit of Measure		Baseline	Actual(Current)	End Target
Marked for Deletion	Road Sector Organizational Study Prepared	<input type="checkbox"/>	Date	Value		30-Nov-2016	
				Date	01-Oct-2012	30-Apr-2013	01-Oct-2015



				Comment		Under the donor coordination mechanism, the government decided to work with USAID on the sector reform agenda of which road sector study is a critical part. More comprehensive organizational studies have been developed via USAID sponsorship. The indicator is therefore to be dropped from the result indicators.	The Government has started working with USAID on the sector reform. TORs proposed by the project have been shared with USAID. More comprehensive organizational studies have been prepared by the client.
No Change	Financial Management System in MRRD and MPW developed and functional	<input type="checkbox"/>	Date	Value		30-Apr-2014	
				Date	01-Oct-2012	30-Apr-2014	01-Oct-2014
				Comment	No reliable system	System in place.	System in place
No Change	Cost estimation system developed and fully functional	<input type="checkbox"/>	Date	Value		01-Oct-2014	
				Date	01-Oct-2012	30-Apr-2014	01-Oct-2014
				Comment	No reliable system in place	Cost estimation system is currently developed and functioning.	System in place
No Change			Date	Value		30-Apr-2016	

	Design standards developed and adopted	<input type="checkbox"/>		Date	01-Oct-2012	30-Apr-2013	01-Oct-2016
				Comment	Incomplete design Standard	Design standards developed and adopted.	Standards being adopted
No Change	Improved Network Management system in place	<input type="checkbox"/>	Date	Value		01-May-2016	
				Date	01-Oct-2012	01-May-2016	01-Sep-2015
				Comment	No reliable system in place	System in place and functioning.	System in place and functioning.
Revised	Complete Road Inventory	<input type="checkbox"/>	Percentage	Value	0.00	68.00	100.00
				Date	01-Oct-2012	30-Oct-2016	30-Jun-2019
				Comment	Inventory available but outdated and does not provide essential information.	Inventory system of 95% major highways and 67% secondary roads have been set up. Achievement of target delayed due to security deterioration.	Inventory system for 100% of roads under central government mandates (including major highways, secondary roads and tertiary roads under NRAP sponsorship) must be in place.
Revised	Roads constructed, Rural	<input checked="" type="checkbox"/>	Kilometers	Value	0.00	2138.00	2670.00
				Date	01-Jan-2012	30-Oct-2016	15-Mar-2020
				Comment			Under Scenario \$105m, main efforts are to

							cover cost overrun of secondary roads, with limited scale up on tertiary roads, about 120 km. Secondary road: 1250+0km; and Tertiary road: 1300km+120km ]  Under Scenario \$155m, 100km more secondary roads, and 300km more tertiary roads are to be built. Secondary roads: 1350 (1250+100km); Tertiary roads: 1600km (1300+300km).
Revised	Km of gravel surfaced secondary roads rehabilitated	<input type="checkbox"/>	Kilometers	Value	0.00	561.00	1000.00
				Date	01-Jan-2012	30-Oct-2016	15-Mar-2020
				Comment			Parent project: 1000 km; Add financing for both scenarios: no extra gravel roads; but only 1

							road dropped and another substituted it.
Revised	Km of asphalt surfaced secondary roads rehabilitated	<input type="checkbox"/>	Kilometers	Value	0.00	232.00	250.00
				Date	01-Oct-2012	30-Oct-2016	15-Mar-2020
				Comment			Parent project: 250km; Add financing (Scenario \$155m): 100km; [No scale up under Scenario \$105m]
Revised	Construction of bridges on secondary roads	<input type="checkbox"/>	Meter(m)	Value	0.00	1351.00	1351.00
				Date	01-Oct-2012	30-Oct-2016	15-Mar-2020
				Comment		achieved the target (1000 m) with 350 line-meters more.	Parent project: 1000 m; plus Add financing (Scenario \$155m): 700m, [No scale up under Scenario \$105m; but to keep achieved 1351 meter]
Revised	Km of secondary roads under routine and periodic maintenance scheme	<input type="checkbox"/>	Kilometers	Value	0.00	1870.00	1870.00
				Date	01-Oct-2012	30-Oct-2016	15-Mar-2020
				Comment		achieved target (1000km) with 870 km more	Parent Project targets 1000km and actually 1870km have been achieved.

							[No scale up under both Scenarios]
Revised	Km of tertiary roads rehabilitated	<input type="checkbox"/>	Kilometers	Value	0.00	1341.00	1420.00
				Date	01-Oct-2012	30-Oct-2016	15-Mar-2020
				Comment		achieve the target (1300km) with 41km more	Parent project: 1300km; Add financing [Scenario \$155m]: 300km. [Under Scenario \$105m, about 120km more]
Revised	Construction of bridges on tertiary roads	<input type="checkbox"/>	Meter(m)	Value	0.00	1800.00	1800.00
				Date	01-Oct-2012	30-Oct-2016	15-Mar-2020
				Comment		achieved target (1600 meters) with 200 meters more	Parent project: 1600 m; now project has achieved target with 200 meters more, 1800m. Add financing [Scenario \$155m]: 350m more, i.e. 1950 meters.
Revised	Km of tertiary roads under routine and periodic maintenance scheme	<input type="checkbox"/>	Kilometers	Value	0.00	3750.00	3750.00
				Date	01-Oct-2012	30-Oct-2016	15-Mar-2020
				Comment		achieved the target (2000 km) with 1750 km more	under Scenario \$155m, it will achieve about 5000km;

							But under Scenario \$105m, will keep 3750 km although the original target in parent project is 2000km
New	Job opportunities created via the intervention	<input type="checkbox"/>	Days	Value	0.00	0.00	2800000.00
				Date	30-Jun-2016	30-Jun-2016	15-Mar-2020
				Comment	Currently more than 9.12 million employments have been created in the parent project roads.		Additional 4.6 million under the Add Finance Scenario \$155m, which results 13.74 million labor days more employment from the AF. Additional 2.8 million labor days more employment under Scenario \$105m.
New	Number of People trained or re trained	<input type="checkbox"/>	Number	Value	830.00	833.00	830.00
				Date	30-Jun-2016	30-Oct-2016	15-Mar-2020
				Comment	Via current internship program about 833 persons per year have		Under Scenario \$105m, the project will keep 830 persons per year since no

					been trained or re-trained under the project.		job enhancement measures under this scenario. Under Scenario \$155m, skill trainings to the project roadside communities and private companies are added. Plus the internship program already in place, the two efforts result about 1800 persons per year.
New	Female: Number of people trained or retrained	<input type="checkbox"/>	Number Sub Type Breakdown	Value	45.00	47.00	45.00
				Date	30-Jun-2016	30-Oct-2016	15-Mar-2020
				Comment			Under Scenario \$155m, about 20 percent of total number should be targeted to women trainees (about 360 persons per year).

## Annex 2. Detailed Description of Project Activities

1. The AF operation of US\$155 million for the ARAP (P125961), with US\$105 million funding from the ARTF and US\$50 million financial gap contingent on availability of funds from IDA or the ARTF, good project performance, and clarification from the Government on the tertiary road activities of the Citizens' Charter Afghanistan Project. The AF aims to: (a) ensure that the project will achieve its original PDO and (b) extend the network coverage to improve all-season accessibility to a larger portion of the rural population, including scaling up of other co-benefits, especially job creation, while increasing network coverage.

### Parent Project Implementation Progress (additional info)

2. **Implementation progress.** Table 2.1 shows the project implementation ratings under each Implementation Support Report. Performance ratings for almost all aspects have achieved "Satisfactory". Tables 2.2 and 2.3 demonstrates the good performance on physical works and committed works. By October 31, 2016, all major road construction and maintenance works have exceeded the original targets, except the road construction works on secondary roads. This is due to the financing gaps in the revised costs from the detailed design.

**Table 2.1. Project Performance – Afghanistan Rural Access Project (P125961)**

Archived ISR	Aug 6, 2015	Oct 15, 2015	May 16, 2016	Nov 10, 2016
Summary DO rating	S	S	S	S
Overall IP ratings	S	S	S	S
Overall Risk Rating	H	H	H	H
Safeguards rating	S	S	S	S
Financial management	S	MS	S	S
Project management	S	S	S	S
Procurement	S	S	S	S
Monitoring and evaluation	MS	MS	S	S
<b>Project components</b>				
Component A	S	S	S	S
Component B	S	S	S	S
Component C	S	S	S	S
<i>Note: H = High; MS = Moderately Satisfactory; S = Satisfactory.</i>				



**Table 2.2. Physical Progress – Afghanistan Rural Access Project (US\$, millions) (P125961)**

<b>Component/Activities</b>	<b>Original Scope</b>	<b>Achieved (as of Nov 10, 2016)</b>	<b>Commitment in km or running meters (as of Jan 31, 2017)</b>	<b>Original Investment</b>	<b>Commitment as of Dec 31, 2016</b>
<b>A. Improvement and Maintenance of Secondary Roads (MPW)</b>					
i. Rehabilitation of about 1,000 km, gravel surface secondary roads	1,000 km	561 km	603.6 km	67.5	71.00
ii. Upgrading of about 250 km of secondary roads to bituminous standards	250 km	232 km	261 km	40.0	57.90
iii. Bridge construction work for about 1,000 linear meters	1,000 m	1351 m	1,366 m	9.0	14.00
iv. Routine and periodic maintenance for about 1,000 km of secondary roads and provision for emergency maintenance	1,000 km	1,870 km	1,900 km	21.0	18.00
<b>B. Improvement and Maintenance of Tertiary Roads (MRRD)</b>					
i. Improvement of about 1,300 km of tertiary roads to gravel surface standard	1,300 km	1,341 km	1,491 km	58.5	74.40
ii. Bridge construction works for about 1,600 linear meters	1,600 m	1,800 m	2,140 m	10.0	11.16
iii. Routine and periodic maintenance of about 2,000 km of tertiary roads and provision for emergency maintenance*	2,000	3750 km	4200 km	25.0	18.74

*Note:* PM = Periodic maintenance; RM = Routine maintenance.

\* Routine maintenance commitment is on annual basis and is repeated each year.

**Table 2.3. Breakdown for Commitment (US\$, millions)**

<b>Component/Activities</b>	<b>Original Investment</b>	<b>Commitment as of Jan 31, 2017</b>	<b>Remarks</b>
<b>A. Improvement and Maintenance of Secondary Roads (MPW)</b>			
Secondary road work for about 1,000 km, gravel surface	67.5	71.00	—
Secondary road work for about 250 km, asphalt surface	40.0	57.90	—
Bridge construction work for about 1,000 m	9.0	14.00	—
Secondary road maintenance for about 1,000 km roads	21.0	18.50	—
Implementation support (IC and PIU staff)	42.0	24.00	US\$4 million reallocated to works
<b>Subtotal for Secondary Roads</b>	<b>186.0</b>	<b>185.90</b>	—
<b>B. Improvement and Maintenance of Tertiary Roads (MRRD)</b>			
Tertiary road work for 1,300 km, gravel surface	58.5	74.40	—
Bridge construction work for 1,600 m	10.0	11.16	—
Tertiary road maintenance for 2,000 km roads	25.5	18.74	—
Implementation support (IC and PIU staff)	34.0	28.91	US\$1.5 million reallocated to works
<b>Subtotal for Tertiary Roads</b>	<b>128.0</b>	<b>133.21</b>	—
<b>C. Program Planning and Development, Institutional Strengthening and Program Coordination Support</b>			
Setting up a rural roads planning and management system	5.0	1.40	—
Institutional strengthening	7.0	6.20	—
Project implementation support	6.0	5.62	—
<b>Subtotal for Institutional Strengthening</b>	<b>18.0</b>	<b>13.22</b>	—
<b>Total Project Cost</b>	<b>332.0</b>	<b>331.83</b>	—

**Table 2.4. Project Disbursement up to Feb 28, 2017**

	<b>IDA H7920</b>	<b>TF 13093</b>
<b>Approval Date</b>	Jun 26, 2012	Sep 15, 2012
<b>Closing Date</b>	Mar 31, 2018	Mar 31, 2018
<b>Amount</b>	US\$125.00 million	US\$207.00 million
<b>Disbursement</b>	US\$121.53 million	US\$158.72 million
<b>Project Age</b>	4.7 years	4.4 years

### **Additional information on project components**

3. Project components have been defined in Section II Proposed Changes. Table 2.5 below shows the details of cost overrun and scale ups for each component.

4. In *Component A*, additional US\$4 million allocated to extend the secondary road maintenance works. The scale-up activities target both the MPW headquarters and three selected provincial directorates. The maintenance camps are for the directorates to store essential materials and equipment. Based on the market research, these maintenance camps and equipment and devices make it possible for poor local communities to be involved in maintenance works. Related consulting services and technical assistance are included in the implementation support activities under Components A and C.

5. In *Component B*, additional US\$ 3 million financial supports are provided to tertiary road maintenance. Slightly different from those of Component A, the MRRD is the rural infrastructure and service facilitator for villagers and O&M support to the MRRD is focused on assisting its provincial departments to set up a tertiary road inventory system and supervise the CDCs and beneficiary enterprises on O&M. Procurement of machines or equipment for road condition data collection are included in this subcomponent.

6. In *Component C*, subcomponent of “*program coordination support*” is set up to cover the operating costs of National Coordination Unit (MOF) and also used as a contingency item to cover macro-economic risks. Almost all components suffered from the loss of IDA SDR exchange rate changes which reaches US\$3 million.

7. “*Setting up a rural roads planning and management system*” in Component C, a network planning, development, and management system was initially set up in the parent project. To further enhance the system and technical capacity of the Government, Peshawar - Torkham - Jalalabad - Kabul Economic Corridor, one of the most important economic corridors, is selected for a detailed study by the Government. The study will include appraisal of engineering options of an expressway running through the corridor and assessments of local transport network<sup>4</sup> and regional development inside the Corridor. The study approach is to deliver a pre-feasibility study or feasibility study for the potential expressway together with various local and rural network development scenarios attached to the expressway options. This approach responds to the needs of economic corridor development. Also because the

<sup>4</sup> About 80 percent of the network is secondary and tertiary roads.

Government has already set up a well-performed project team, it is cost effective to deliver such study in the AF. The additional activity is expected to cost about US\$5 million.

**Table 2.5. Additional Financing Budget Allocation (US\$, millions)**

Description		Current Allocation	Breakdown		Additional Funds	Proposed Total Allocation
			Cost Overruns	Scaling up		
(i)	Rehabilitation of gravel surface secondary roads	67.5	52	0.0	52.0	119.5
(ii)	Upgrading secondary roads to bituminous standards	40.0	20	25.0	45.0	85.0
(iii)	Bridge construction work	9.0	1	7.0	8.0	17.0
(iv)	Routine and periodic maintenance of secondary roads and provision for emergency maintenance	21.0	0	4.0	4.0	25.0
(v)	Project management and implementation support (IC and PIU staff)	48.5	-4*	0.0	-4.0*	44.0
<b>Subtotal of Component A</b>		<b>186</b>	<b>69</b>	<b>36.0</b>	<b>105.0</b>	<b>291.0</b>
(i)	Improvement of tertiary roads	58.5	0	34.0	34.0	92.5
(ii)	Bridge construction works	10.0	0	4.5	4.5	14.5
(iii)	Routine and periodic maintenance and provision for emergency maintenance	25.5	0	3.0	3.0	28.5
(iv)	Project management and implementation support (IC and PIU staff)	34.0	0	-1.5*	-1.5*	32.5
<b>Subtotal of Component B</b>		<b>128.0</b>	<b>0</b>	<b>40.0</b>	<b>40.0</b>	<b>168.0</b>
(i)	Setting up a rural roads planning and management system	5.0	0	5.0	5.0	10.0
(ii)	Institutional strengthening and capacity building	7.0	0	2.0	2.0	9.0
(iv)	Program coordination support	6.0	3**	0.0	3.0	9.0
<b>Subtotal of Component C</b>		<b>18.0</b>	<b>3**</b>	<b>7.0</b>	<b>10.0</b>	<b>23.0</b>
<b>Total</b>		<b>332.0</b>	<b>72</b>	<b>83.0</b>	<b>155.0</b>	<b>487.0</b>

*Note:*

\* Relocation of non-works to works;

\*\* Financial loss due to IDA exchange rates.

8. *Institutional strengthening and capacity building in the rural road sector.* The following additional activities are to be carried out:

- a. *Vocational training:* Having seen the shortage of skilled labor and experienced engineers in the job market, the project will enhance its vocational training program for road professionals. The subcomponent includes expanding internship programs to graduated professionals and skill training to the staff of ministries, contractors, and private consulting firms, and local communities. The subcomponent will sponsor the MPW and the MRRD to utilize their own fixed assets, like classrooms and hire experienced engineers and proper teachers via consultant contracts for the training purposes. About 20–30 percent of the vocational trainees will be female.

- b. *Other technical support* includes studies of commercializing implementation service delivery, analysis of feasible measures of enhancing the client functions of project planning, study of quality assurance and fiduciary (procurement, FM, and contract management) management; and policy research to involve the private sector.

9. ***Component D: Contingency Emergency Response*** will allow for a rapid response following an adverse natural or man-made event that causes a major disaster, through the reallocation of project funds. Disbursements under the component will be contingent upon the fulfillment of the following conditions: (a) the GoIRA (Government of Islamic Republic of Afghanistan) has determined that an eligible crisis or emergency has occurred and the World Bank has agreed and notified the Government; (b) the line ministries have prepared and adopted the Contingent Emergency Response Implementation Plan agreed with the World Bank; (c) the line ministries have prepared, adopted, and disclosed safeguards instruments required as per World Bank guidelines for all activities from the Contingency Emergency Response Implementation Plan for eligible financing under Contingency Emergency Response Component.

10. *Procurement arrangements for Component D.* Execution of funds through the Contingency Emergency Response Component will be procured based on Guidance Note: Rapid Response to Crisis and Emergencies - Streamlined Procurement Procedures June 2009 which is implemented under OP/BP 10.0, Rapid Response to Crisis and Emergencies.

11. Disbursements would be made against a positive list of critical goods or the procurement of works, and consultant services required to support immediate response and recovery needs. Should it be triggered, all expenditures under this component will be in accordance with paragraph 11 of OP/BP 10.00 and will be appraised, reviewed, and found to be acceptable to the World Bank before any disbursement is made. In accordance with paragraphs 11 and 12 of OP/BP 10.00, this component would provide immediate and rapid disbursement support to finance the necessary goods (according to the positive list agreed with the Government), works, and services. Operating costs eligible for financing would include incremental expenses incurred for early recovery efforts arising as a result of the major natural disasters.

12. Goods, Works and Services under this component would be financed based on review of satisfactory supporting documentation presented by the Government, including adherence to appropriate procurement practices in an emergency context. All supporting documents for reimbursement of such expenditures will be verified by the internal auditors of the Government and by the PIU directors, certifying that the expenditures were incurred for the intended purpose and to enable a fast recovery following the damage caused by adverse natural events, before the withdrawal application is submitted to the World Bank. This verification should be sent to the World Bank together with the withdrawal application.

13. Specific eligible expenditures under the category of Goods may include (a) construction materials, water, land, and air transport equipment, including supplies and spare parts; (b) school supplies and equipment; (c) medical supplies and equipment; (d) petroleum and fuel products; (e) construction equipment and industrial machinery; and (f) communications equipment. Works may include urgent infrastructure works (repairs, rehabilitation, construction, and so on) to mitigate the risks associated with the disaster for affected populations. Services may include urgent studies (either technical, social, environmental, and

so on) necessary as a result of the effects of the disaster (identification of priority works, feasibility assessments, delivery of related analyses, and so on).

14. Table 2.6 shows the budget allocations for each component under the scenarios of confirmed US\$105 million and total fund of US\$155 million.

**Table 2.6. Budget Allocation (US\$ million) of Scenarios of Confirmed (US\$105 million) and Total Funds (US\$155 million)**

	<b>Scenario 1, with Confirmed US\$105 million</b>	<b>Scenario 2, with Total US\$155 million</b>	<b>Remarks</b>
<b>Component A</b>	82	105	Cost overrun to be covered first under Scenario 1
<b>Component B</b>	15	40	Scenario 1 enables limited scale-up for tertiary road
<b>Component C</b>	8	10	Vocational training to be done under Scenario 2
<b>Total</b>	<b>105</b>	<b>155</b>	—

15. **The AF focuses on enhancing secondary road network connectivity by filling the network’s basic connectivity gaps with unpaved roads and upgrading large traffic volume roads to paved standards to sustain proper service levels.** The former efforts mainly focus on extending the secondary network in Wakhan Corridor, while the AF is focused on a selected large volume secondary road corridor, Panjab (Bamiyan Province) – Nillie (Daykondy Province). The two gaps and the large volume corridor are selected based on the latest network transport planning study which was carried out in the parent project together with proper economic analysis.

16. **The AF targets on labor-intensive transport infrastructure construction and maintenance to generate job opportunities.** Specifically, the AF activities are labor-intensive construction and maintenance works, with 20–25 percent of investment directly going for labor costs. On the macro-level, network extension and service-level improvements aim to reduce inequality and vulnerability in market/service access. Essential policy research, contract management enhancement measures, and procurements of critical maintenance equipment and technologies reduce the work costs, improve the efficiency of maintenance and also lower the market entrance bars for rural communities’ and private sector’s involvement in infrastructure O&M. Institutional supports to enhance the planning and design capacities are necessary to facilitate more labor-intensive solutions. Other activities, for example, vocational training for rural unskilled labor, also support the job agenda.

17. **The AF supports tertiary road network accessibility by extending network coverage to isolated villages and improving road conditions to support agriculture products and rural development.** The country still has more than 4,900 villages out of about 45,000 villages in total that are not accessible via 4-wheel vehicle roads, that is, more than 2 km away from the roads. On the other hand, deteriorated road conditions and long transport time become bottlenecks for rural development, for example, agriculture products and rural handicrafts. Coordinating with the secondary road network extension, the MRRD will extend network coverage to up to about 100 isolated villages in this AF.

18. Moreover, as a pilot, the AF targets selected agriculture products and development areas, namely vegetable and fruit products and local handmade porcelain products, which are sensitive to road conditions as well as transport services like storage.<sup>5</sup> Tertiary roads selected for improvement of road conditions will be shortlisted taking into account the following aspects:

- (a) Producing the country's most famous products;
- (b) Strong leverage functions for the development of other economic sectors to improve rural employment;
- (c) Significant social and environmental benefits for rural development;
- (d) Fiscal sustainability and strong feasibility of 'self-reliance';
- (e) Beneficiary's strong willingness to pay for part of road construction or O&M costs or to maintain the road assets themselves;<sup>6</sup>
- (f) Cross support feasibilities/possibilities with other Government or World Bank-financed projects (areas having other World Bank-financed rural development projects taking priority); and
- (g) Project area/s with quality paved national highway and secondary road network coverage.

19. Working with the ongoing AREDP and other rural enterprise promotion projects, the AF will provide support to exploring new mechanisms for beneficiary enterprises in the O&M of tertiary road and other transport assets like storage. Moreover, under the project bridge construction, optimizing the design of combining with mini-hydro option will also be investigated to provide complementary benefits to the local population and achieve fiscal sustainability of asset management.

20. **Bamiyan Valley accessibility improvements (about US\$5 million).** The proposed Bamiyan Valley accessibility improvement measures, including traffic diversion from heritage sites and access roads to the sites, are an important part of the Bamiyan Valley UNESCO Cultural Heritage Improvement Plan. Bamiyan Valley has acute challenges of balancing land use for local economic development and protection of world famous cultural heritage. Figure 2.1 shows the map of the road network in Bamiyan Buddha area. The proposed measures divert vehicle traffic away from National Road A77 in front of the cultural protection sites and improve pedestrian access to the sites. This has considerable direct benefits in improving the outstanding universal value of the Bamiyan Buddha sites. Furthermore, such traffic calming measures with special pavements matching surrounding environments will contribute substantial improvements in business opportunities for local markets. Bamiyan remains as an attraction for both domestic and foreign tourists. Based on the statistics of the Bamiyan Buddha Administration Office, a substantial number of domestic tourists can be expected to be

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<sup>5</sup> Subject to the detailed evaluation of the site and analysis of supply chain of local products, storage facilities and loading areas can also be supported. Costs of building up such storage facilities are a marginal part of total road costs (generally less than 5 percent).

<sup>6</sup> Local communities or local beneficiary enterprises are expected to be responsible for the O&M of the paved tertiary roads and related facilities. The O&M agreements between the MRRD and the local communities or the enterprises are essential before the project road goes for tendering.

sustainable and potentially to increase in the coming years. Such traffic calming measures will definitely bring significant benefits to the local economy. Figure 2.1 shows the traffic diversion and areas for access improvement.

21. **The AF extends O&M support to the line ministries to address management and operational issues.** The MPW is responsible for the country's national highways and secondary road networks and the MRRD is the rural infrastructure and service facilitator for villagers.

22. O&M support to the MPW is therefore focused on improving the capacity of selected provincial departments and lowering the barriers in involving micro and small rural enterprises in O&M. An analysis of the O&M practice of the MPW highways and secondary roads shows the following bottlenecks:

- (a) **Difficult site accessibility:** For example, given the mountainous terrain, it takes on average 4–8 hours to go from a district center to a provincial center in Bamiyan, while in Parwan and Baghlan, it takes about 3–4 hours on average. Maintenance camps to store maintenance tools and materials and to carry out site management tasks and so on, are essential.
- (b) **Outdated/unaffordable maintenance technology:** All four provinces have significant lengths of asphalt roads; however, because of lack of proper maintenance tools, like asphalt plants, it is impossible for a provincial department to take this task in-house. Also, because of the limited amount of maintenance work and expensive machinery inputs, competent contractors show no interest in road maintenance works in which profit margin is generally lower than construction works.
- (c) **Knowledge and capacity gaps for provincial department to carry out O&M:** Provincial departments had been organized under the traditional Soviet Union regime with the thought of carrying out all O&M works through in-house capacity. There are significant knowledge and capacity gaps in the ability of the department to carry out contract management of maintenance contractors, road asset management, and traffic condition surveys.

23. Hence, the interventions are as follows:

- (a) To set up maintenance camps<sup>7</sup> at selected locations;
- (b) To procure and install emulsified and modified asphalt machines in some of the camps to involve rural SMEs and communities in O&M;<sup>8</sup>
- (c) To procure traffic counting and road condition data collection apparatus; and

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<sup>7</sup> The maintenance camps are to enable the provincial departments of public works to store maintenance tools/equipment and materials and to carry out site management tasks and so on. The camps are selected from the Government lands and are not for resident use.

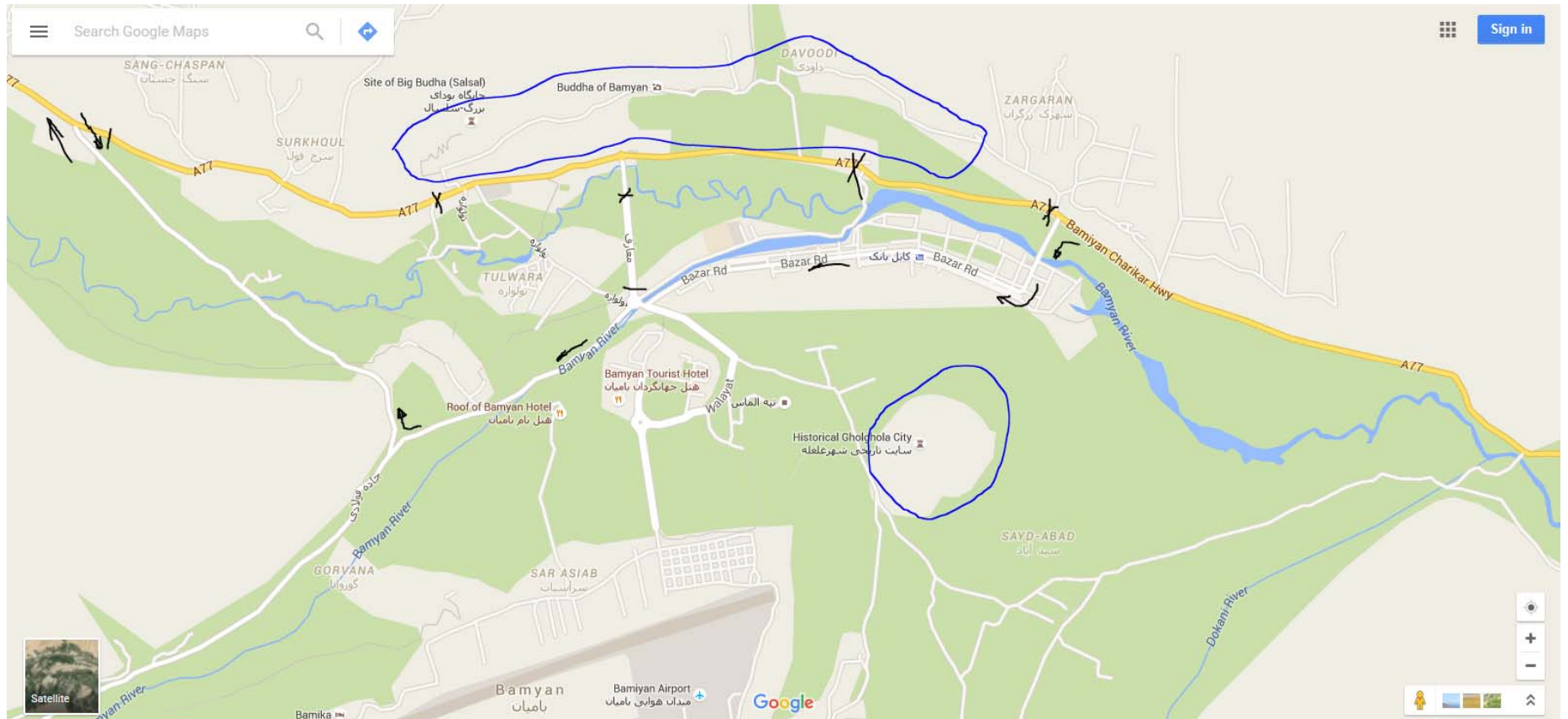
<sup>8</sup> The emulsified and modified asphalt technology is generally cheaper to use in maintenance than the traditional hot mix. Bitumen emulsion and modified asphalt can be mixed with aggregates at normal temperatures, without the need for expensive hot mix asphalt plants and lower down market barriers to involve rural SMEs and local communities in O&M.



- (d) To assist the ministry departments and the selected provincial departments on critical O&M capacity gaps, including transplanting and mainstreaming the road asset management system to the existing Government system, traffic counting and road condition data collection and evaluation, and setting up a community-based and output-based maintenance mechanism.

24. O&M support to the MRRD is focused on assisting provincial departments in setting up a tertiary road inventory system and supervising the CDCs and beneficiary enterprises on O&M.

Figure 2.1. Traffic Diversion of Bamiyan Buddha Site



Source: Google Map

25. **The AF will also support vocational training program seeing the shortage of skilled labor in the road construction market.** The shortage of skilled labor negatively affects the ‘Jobs for Peace’ efforts and also affects the quality of road works. The AF will support the MPW in enhancing its vocational training program for road professionals, while supporting the MRRD and its IRRD as a means of providing skills training to the villagers living in the project road areas.

26. **The AF will provide other technical support,** for example, support to sector reform to improve project implementation services. Having seen the significant improvements in the implementation capacity of the line ministries, the reform policy would further strengthen the Government position to organize the Road Authority, to enhance the consulting market, and to open up the consulting market for private firms and improve the resilience of service delivery capacity. Efforts of government policy research, the Road Authority Reform Plan and research seminars on international experiences, for example, labor-intensive engineering options and management of community-based contracts, are to be sponsored.

27. **Climate change and disaster risk screening.** In compliance with IDA17 priority commitments, this AF-supported operation has been screened to identify, and if relevant, address any potential short- and long-term climate change and disaster risks. The risk screening suggests an overall Moderate risk rating for the project outcome. Therefore, climate change and disaster hazards may pose moderate risk to the achievement of the PDO defined for this operation. The potential impact on the physical components because of exposure from hazards is modulated by the project’s nonphysical components. This risk has been mitigated by a series of design measures including: (a) route realignments to avoid areas with slopes/hydraulic sections vulnerable to climate risks; (b) enhanced slope protection and drainage structures (lessons learnt from preceding projects on management of climactic risks); (c) changes in design standards for pavements that reflects a higher level of climactic resilience; and (d) a decision to seal previously gravel roads for climate resilience. Table 2.7 provides an assessment of the incremental cost-related to such climate resilience measures.

**Table 2.7. Adaptation and Mitigation Co-benefits by Project Component (US\$ millions)**

No.	Component	Activities	World Bank Commitment by Subcomponent	Adaptation Associated Sector	Mitigation Associated Sector
(i)	Rehabilitation of gravel surface secondary roads	Road realignment, enhanced slope protection, redesign to drainage structures, addition of culverts and adjust bridge spans, and so on.	52.0	30	0
(ii)	Upgrading secondary roads to bituminous standards	Enhanced slope protection, redesign to drainage structures, addition of culverts and adjustment of bridge spans, and additional pavement thickness	45.0	20	0

No.	Component	Activities	World Bank Commitment by Subcomponent	Adaptation Associated Sector	Mitigation Associated Sector
(iii)	Bridge construction work	Enhanced slope protection, adjustment of bridge spans	8.00	2	0
(iv)	Routine and periodic maintenance of secondary roads and provision for emergency maintenance	Increased labor works and material costs	400	1	0
(v)	Project management and implementation support (IC and PIU staff)	n.a.	-4*	0	0
<b>Subtotal of Component A</b>		—	<b>105-0</b>	<b>53</b>	<b>0</b>
(i)	Improvement of tertiary roads	Road realignment, enhanced slope protection, redesign to drainage structures, addition of culverts and adjust bridge spans, and so on	34.0	10	0
(ii)	Bridge construction works	Enhanced slope protection, adjustment of bridge spans	4.5	1	0
(iii)	Routine and Periodic maintenance and provision for emergency maintenance	Increased labor works and material costs	3.0	1	0
(iv)	Project management and implementation support (IC and PIU staff)	N/A	-1.5*	0	0
<b>Sub Total of Component B</b>			<b>40.0</b>	<b>12</b>	<b>0</b>
(aD)	Setting up a rural roads planning and management system	Climate Study	5	0.5	0
ii	Institutional Strengthening & Capacity Building		2		0
iv	Program Coordination Support		3		

No.	Component	Activities	World Bank Commitment by Subcomponent	Adaptation Associated Sector	Mitigation Associated Sector
	Subtotal of Component C.		10	0.5	0
	Total		155	65.5	0

28. **Under this AF, as a first step, the Government will consider adaptation and mitigation measures to address climate change.** First, based on the network planning study and road inventory surveys in the parent project, the AF will continuously survey the all-season accessibility of road network and help the Government to develop an improvement plan. Second the line ministries will continuously work with the World Bank and a thirdparty monitoring firm to take into account more climate-resilient design standards and have technical reviews on rolling bases. Third, the proposed cost overruns and pavement upgrading have considered specific measures, for example, enhanced slope protection to be resilient to the more frequent extreme weather conditions. These specific measures will be further implemented and optimized in the rest of the designs. Fourth, the line ministries will also work with other stakeholder entities, for example, the National Disaster Management Authority to keep road asset at a defined level of service and provide all-season roads. Currently, the client is exploring another Technical Assistance project with the World Bank’s DRM team to carry out network service-level assessments and detailed assessments on critical roads of network so as to better understand the nature of the risks and mitigate them. Last, besides the emergency maintenance subcomponents in the parent project, a new Component D is added to enable the Government to mobilize enough resources, including funds, in response to any emergencies or national disasters that may occur in the future. Supporting activities will also be envisaged to make sure that in case of emergencies, including those related to climate change and climate variability, the response can be quick and service can be reinstated promptly.

29. **Labor Influx:** The AF activities are labor intensive construction and maintenance works, but nevertheless, labor influx related risks are classified as “Low”.

30. *Experience in the parent project shows that there had not been any negative impact of labor influx under the parent project.* Based on the technical sophistication and size of works, the works are organized via three different ways, namely community based, post reviewed National Competitive Bidding (NCB) and prior reviewed NCB contracts. The works carried out via community-based contracts are less technical sophistication and labors are all locally recruited. To analyze the potential impacts, largest size prior-reviewed NCB contracts from the parent projects had been selected and reviewed. It reveals that, only up to about 20 -30 persons (which accounts about 5 percent of the workers and mostly skilled labor) were recruited from outside while the rest were recruited locally in the project road area. For site management and staff security reasons, the site offices and living spaces of the workers and team management were arranged in district centers or large villages where the population are above 1,000 and absorption capacity are high.

31. The current procurement plan for the AF activities has a total of 176 road-sub-projects. Of these, 10 are community-based contracts and the remaining 166 subprojects are secondary (69 sub-projects) and tertiary (97 sub-projects) road-contracts and none of these road-contracts required prior review. The secondary and tertiary road-contracts are expected to involve some very limited labor influx of approximately 10 workers under each road-contract in the project area. The majority of the labors, more than 90 percent will be recruited locally.

32. Besides the contracts in the present procurement plan, it is also expected a few road sections which are now under design might be implemented under prior review NCB contracts. As per the experience in the parent project, labor under prior reviewed contracts will be largely recruited locally, overall labor influx related risks are low. However, site specific ESMP will be prepared for each contracts to incorporate measures to mitigate negative impacts of labor influx on local communities and vulnerable groups, such as risks of social conflict, increased risk of communicable diseases, traffic accidents and etc. Table 7 below provides the guideline to incorporate labor influx issues while compiling site specific ESMP for prior reviewed contracts only or any other exceptional circumstances of high labor influx potentials. Also safeguard staff of the PIUs are to be trained to address and resolve labor influx issues.

CROSS-CUTTING ISSUES	
Elements	Measures
<b>Assess the magnitude of labor influx, relevant contextual factors, and related legal &amp; institutional framework</b>	<ul style="list-style-type: none"> <li>• There will be one labor camp in each of the road-subproject area. An average 10 workers would reside in each labor camp during construction (for approximately 10 months). Unskilled workers are expected to be largely recruited locally in the project area. All these locally recruited will continue living in their homes, except where work sites are far away from their villages, in which case they would reside in the labor camps, as would workers from outside the immediate road alignment.</li> <li>• Consultations with local communities were conducted for each site and the results of these were used for preparing the site specific ESMP and abbreviated RAP (where required).</li> </ul>
<b>Ensure the capacity of the implementing agency to manage environmental and social impacts</b>	<ul style="list-style-type: none"> <li>• The PIUs at MRRD &amp; MoPW have Environmental and Social, with sufficient, experienced and qualified staff.</li> <li>• The PIUs' environmental and social team capacity will be periodically reassessed to ascertain that appropriate staffing is maintained throughout the life of the AF activities.</li> <li>• An independent third party monitoring agent (MSI) is being hired for the AF activities, whose team includes social and environmental specialists who will monitor/ report all social and environmental activities required in the project, including labor influx issue.</li> </ul>
<b>Contractually bind the Contractor to carry out environmental and social impact mitigation</b>	<ul style="list-style-type: none"> <li>• The Contractor is explicitly required under its contract to abide by the provisions of the site-specific ESMP.</li> <li>• Before works may begin, the Contractor is required to obtain approval for its Contractor's camp, including plan for implementation of social and environmental risks, including labor influx.</li> <li>• The works contract specifies the sanctions that the Contractor will face if the contractor-related provisions of the site-specific ESMP is not adhered to, including by sub-contractors.</li> <li>• The Contractor is required to have specific and qualified key staff (Environmental and Social expert) to manage environmental and social mitigation and implement the project's safeguard instruments. The contractor safeguards expert will be responsible to verify compliance with and implementation of all mitigation measures. Physical works can only commence once these key staff are engaged.</li> </ul>
<b>Establish a mandatory Code of Conduct for workers</b>	<ul style="list-style-type: none"> <li>• The site specific ESMP explicitly calls for the Contractor to establish and enforce the employees' Code of Conduct (CoC), including prevention of HIV/AIDS/STCs, prohibition of gender-related violence, treatment of minors, and other behaviors affecting community residents. PIUs will review and approve the CoC before physical works commence.</li> <li>• The Contractor is required to implement the CoC.</li> </ul>

	<ul style="list-style-type: none"> <li>• The Contractor’s social team is required to provide training to all workers on the CoC. The training will be applied to 100% of the workers. PIUs at the MRRD &amp; MoPW &amp; MSI (third party monitoring agent) will monitor compliance.</li> <li>• The Bank will advise on good practice models of CoCs, including sanctions if breached.</li> </ul>
<b>Reporting and auditing</b>	<ul style="list-style-type: none"> <li>• The PIUs will prepare regular reports on the Contractor’s compliance with all environmental and social impact mitigation plans.</li> <li>• The MSI (third party monitoring) will also conduct audit of compliance with the site-specific ESMP and Abbreviated RAP to ensure compliance.</li> </ul>
<b>SOCIAL IMPACTS</b>	
<b>Potential Adverse Impacts</b>	<b>Mitigation Measures</b>
<b>Aggravation or exploitation of social conflicts</b>	The Social Assessment (SA) & site-specific ESMPs have carefully analyzed and taken into account pre-existing cultural or ethnic differences among groups in the project area.
<b>Increased burden on public service provision, increasing costs to or crowding out the local population</b>	Labor camps will provide their own water supply, electricity, wastewater treatment, solid waste disposal, medical services and transportation services, with no negative impacts on the supply of such services to local residents.
<b>Resettlement, compensation related to labor camps</b>	<ul style="list-style-type: none"> <li>• Sites for labor camps in project areas are most often on land leased for the duration of project execution, thereby avoiding any land acquisition.</li> </ul>
<b>Increased risk of communicable diseases</b>	<ul style="list-style-type: none"> <li>• The Contractor’s social team is required to provide training to all workers on HIV/AIDS/STD prevention, in coordination with the local health service and with additional support of specialized entities in the project area. The training will be applied to 100% of the workers. PIUs &amp; MSI (third party monitoring agent) will monitor compliance.</li> </ul>
<b>Gender-based violence and misconduct</b>  <b>Illicit behavior and crime affecting the local population</b>	<ul style="list-style-type: none"> <li>• The Contractor is required to fully enforce compliance by its workers with the Code of Conduct, including application of sanctions.</li> <li>• The Contractor is required to monitor the entry and exit of all personnel and visitors in and out of the labor camp.</li> <li>• PIUs and the Contractor will maintain outreach to law enforcement and legal services for women, children and teenagers, to facilitate prompt and effective responses when needed.</li> <li>• The Grievance Redress Mechanism includes a specific mandate to address any kinds of gender-based violence.</li> <li>•</li> </ul>
<b>Child labor and school dropout</b>	<ul style="list-style-type: none"> <li>• The works contract includes a clause prohibiting the economic exploitation of minors and employment that is deemed dangerous, which interferes with</li> </ul>

	education and/or risks their health or physical mental, spiritual moral or social development.
<b>Camp-related traffic and road safety</b>	<ul style="list-style-type: none"> <li>• The site-specific ESMP provides detailed guidelines for the Contractor on road safety in and around the camps, using signage, traffic control personnel, barriers, lighting, reflectors, proper pedestrian access, proper detours and access roads, and public information.</li> <li>• In reviewing the road design, the Supervision Consultant will undertake a road safety audit.</li> <li>• Contractor will prepare a Traffic Management Plan which will require approval by the PIUs.</li> </ul>
<b>Labor conditions</b>	<ul style="list-style-type: none"> <li>• The Contractor will be required to prepare and obtain approval of an Occupational Safety and Health (OHS) plan for its workers at the work site and in the labor camps.</li> <li>• The site-specific ESMP provides detailed guidelines on labor health and safety.</li> <li>• The site-specific ESMP calls for the Contractor to abide by the norms for design, construction and management of labor camps per “Labor Accommodation: Processes and Standards”, a Guidance Note by IFC and the EBRD, found at the following link:</li> <li>• <a href="http://www.ebrd.com/downloads/about/sustainability/Workers_accomodation.pdf">http://www.ebrd.com/downloads/about/sustainability/Workers_accomodation.pdf</a></li> </ul>
<b>Camp-related land use, access roads, noise and lights</b>	<ul style="list-style-type: none"> <li>• The site-specific ESMP provides relevant guidelines.</li> </ul>
<b>Closure and site restoration</b>	The site specific ESMP includes detailed provisions for work camps’ closure and site restoration, including removal of buildings and ancillary facilities, rehabilitation of access ways, removal of all materials and equipment, restoration of the topography to its original state, and replanting of trees and other vegetation.

### **Institutional Arrangements**

33. The overall institutional arrangements, for example, project steering panel and staffing of PIUs and the NCU, will remain the same as those agreed in the parent project. Minor adjustments to the existing arrangements have been made, considering the changes resulting from (a) UNOPS’ departure, and (b) MRRD change management.

34. **Domestic institutions and local consultants have successfully taken over all project management responsibilities from the UNOPS and mitigation measures with regard to FM risks are in place.** In the early phases of implementing the parent project, the line ministries relied on the UNOPS to implement the project. Since 2012, however, MPW and MRRD (with the support of the Bank and after training received from UNOPS) have been gradually taking over more of the project management roles and responsibilities. The day-to-day supervision functions of the UNOPS were reduced and local consultants hired by both ministries have since been capable of handling most of the technical and safeguards issues, procurement, and part of the FM responsibilities. This reform has greatly increased the participation and ownership of the line ministries in project implementation. More recently, the new Government is putting an even greater emphasis on increasing the role of national institutions and local consultants in project implementation which should soon lead to a full assumption of all project responsibilities. All involved ministries, the MPW/MRRD/MOF, are



keen to use national capacity to deliver larger-sized and technically complex projects such as the AF.

35. It was recognized that important inefficiencies and bottlenecks had existed inside the Government's budget execution system which caused major payment delays. Therefore, the Government, at the beginning of the project, hired the UNOPS to provide fiduciary management services, using a parallel system, including a float account for disbursements. The Government has been keen to remedy the weaknesses in its own fiduciary management system and has not extended the contracts with the UNOPS. However, it has been discovered that, since the Government started to take over, all major project management responsibilities, such as technical and procurement, have so far worked satisfactorily, except for the payment process. The payment processed via the Government system had taken about 60 to 90 days, which is much longer than the contract stipulated 28 days. In the past 8 months, with the help of UNOPS and the Bank, the line ministries and MOF have reviewed the practice and taken essential reforms. It has been discovered that the average payment processing time has been reduced to 30 days. The FM issue has therefore been addressed. Details of the risk assessments and mitigation measures are proposed in annex 4. In summary, a system to more effectively track the disbursement process is necessary.

36. The implementation support from the World Bank will include monitoring of fiduciary performance-based on identified indicators, review of IFRs, and audit reports, review of compliance with legal covenants, review of progress on agreed actions and review of FM risks.

37. **The MRRD's 'Change Management' will improve the overall service delivery capacity of the ministry.** Since the new MRRD leadership took office in 2015, capacities of all project teams and civil servant systems have been reviewed and gradually reorganized in order to improve the overall ministry's delivery capacity. More specifically, the MRRD PIU team's structure changed from a "Project Organizational Structure," to a more balanced "Matrix Organizational Structure." The fiduciary team of the MRRD PIU including procurement and FM, have been combined with the ministry's other fiduciary teams and formed two new procurement and finance departments. Such changes have the advantages of utilizing the limited resources and technical capacities and sharing them all over the ministry.

38. Having recognized the efficiency and capacity of the PIU and also cognizant of civil servant capacity, the Steering group and the MRRD have agreed, that while improving the MRRD's overall service delivery capacity, the PIU staff and resources which have been allocated to the project need to be stable, with their expertise and capacity fully utilized throughout the project implementation. Moreover, the project manual, the procurement management manual and the Financial Management Manual have been revised and enhanced to reflect such changes to ensure that the resources assigned to the project perform at a satisfactory level and also to support the overall ministry's change management initiative at the management and technical levels.

## Annex 3: Economic Analysis

### Introduction

1. **The economic analysis approach in the AF is based on the same approach that was used in the parent project.** The approach accounts for geographic, network planning, social, and economic elements that were used to identify and select under the parent project—project roads were categorized as ‘basic access/tertiary roads’ or ‘higher standard/secondary roads’ (see table 3.1).<sup>9</sup>

**Table 3.1. Evaluation Approaches for Basic Access and Higher Standard Roads**

Function Types	Road Type (Before Improvement)	Typical Traffic (Vehicles per Day)	Evaluation Approach
Tertiary	Rough roads, mule trails (often closed during winter or rainy season), and low-grade narrow dirt roads, vulnerable to closures	< 300	Prioritization on the basis of indicators of traffic volume, population served, access to essential services, and other socioeconomic indicators and Cost per Beneficiary Index.
Secondary	More established roads, classified as secondary	> 300	In addition to ranking using population and traffic volume and so on, economic analysis using the Highway Development Model 4 or equivalent

2. **Four types of road investments are being undertaken in this project—paved secondary roads, unpaved secondary roads, paved tertiary roads, and unpaved tertiary roads.** Given the differing nature of these four investments, a different methodology has been adopted to evaluate each type of investment (discussed in the following paragraphs). Furthermore, there was a ‘cost overrun’ for the (paved and unpaved) secondary roads identified in the parent project. The economic analysis demonstrates that the roads identified in the parent project are still economically viable for investment. Also, the project roads that have been selected in the scale-up activities are cost-effective.

### *Revised Construction Costs for Secondary Roads*

3. **During project preparation, as reflected in the ARAP preparation documents, it was estimated that the costs of secondary roads would be US\$67,000 for gravel surface and US\$127,000 for asphalt surface roads based on the tendered prices of the earlier NERAP.** Since project effectiveness in 2012, about 64 subprojects for rehabilitation of gravel roads (totaling 608.54 km) and 29 subprojects for asphalt paving of high-priority secondary roads (totaling 260.41 km) have been awarded on the basis of competitive bidding. Moreover, further 391.50 km of gravel roads and 91.60 km of high-priority secondary roads have been surveyed and designed. On the basis of the awarded contract prices, expected completion costs, and estimates based on the detailed designs, it was discovered that the estimated cost in the project appraisal stage was far less than the revised costs (which are US\$145,000 per km and US\$245,000 per km for gravel and asphalt roads, respectively). This implies that 414 km out

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<sup>9</sup> Of the 400 km of higher standard roads that are selected for investment (awarded or planned for AF), 368 km have baseline traffic levels of over 300 vehicles per day.

of 1,000 km of gravel roads and 131 km out of 250 km of asphalt roads are short of funds and cannot be completed under the existing investment envelope.

4. **The costing had been carried out by averaging the quantity of selected NERPA subprojects from nine Afghan regions.** All the selected project road works are ‘rehabilitation’ of existing roads with no section needing new construction or vast improvements on vertical or horizontal alignment. However, since project implementation started, the following aspects have changed significantly from the original assumptions:

*For 1,000 km Gravel Roads*

- a. **Road rehabilitation has become a minor proportion of the overall works.** A considerable number of the 1,000 km gravel roads are ‘new construction’ (725 km) and ‘partially new construction’ (109 km) in the ARAP, while the remaining 197 km are rehabilitation.
- b. **Increased slope stability and drainage structures.** Comparing the rehabilitation costs of the roads from appraisal (average cost of NERAP roads) and implementation stages, the ARAP designs have seen significantly increased amounts of retaining walls, slope protection, and drainage structures. These additional works result from the needs of all-season accessibility and fully comply with the lessons and findings from the World Bank TPM studies in the NERAP.
- c. **Necessary realignments.** In comparison with the NERAP, the ARAP roads are extended to more remote areas. In project preparation, it was assumed that the identified road horizontal alignments might not change in the implementation stage, and therefore the involved works would belong to ‘rehabilitation’. However, site surveys have discovered that 725 km of project roads need to design a new geometry alignment and 109 km of project roads need to have partial realignment. Overstretched climbing length and routing alongside the floodway of planned project roads make the road service below ‘all-season accessible’. Hence, new geometry alignments need to be designed. This also causes excessive cutting of slope and increased height of embankment.

*For 250 km Asphalt Roads*

- (a) **The changes for asphalt roads are the same as for gravel roads.**
- (b) **Pavement design standard changes from the Transport and Road Research Laboratory (TRRL, U.K.) to AASHTO (U.S.) standard:** The British standard was used in the NERAP, but it was found to be most suitable for tropical and subtropical climate. The AASHTO standard is applicable for a wider variety of climates and axle load and the Afghanistan National Standard Authority stipulated the AASHTO standard as its national standard in 2013. Such a fundamental shift in standards has resulted in considerable changes in asphalt pavement thickness, from 5 cm (single layer) before up to 9–11 cm (dual layers). Correspondingly, the cost of pavement construction has more than doubled.

5. **The cost analysis shows that the cost of slope stability and drainage structures represents about 60–65 percent of overall gravel road costs.** The cost of asphalt pavement

approaches 67 percent of road construction costs. Therefore, the total design changes result in a cost hike of more than 60 percent.

6. **Commodity prices.** The prices appreciated by about 10–15 percent in the early stage of project implementation, but the influence of this factor on the total revised cost is marginal (about 1–2 percent).

7. **In summary, the increase in the estimation of construction cost during the implementation stage is a result of (a) site security and accessibility difficulties in the preparation stage and (b) unexpected national design standard changes in implementation.** These two risk factors are beyond the control of the client. Based on this analysis, the financial gap of US\$69 million is considered to be reasonable.

## Economic Evaluation

### *Justification of Cost Overrun*

8. **Secondary paved and unpaved roads experienced a cost overrun at the implementation stage of the parent project.** About 250 km of paved secondary roads were selected for investment for the parent project at appraisal. However, at the implementation stage, it was realized that the cost of paving roads was much higher when site data became available. At this point, a conservative approach was adopted and doubled the cost of construction till more data were collected. Once site inspections were complete, the team reanalyzed the roads that had been selected under the parent project based on the revised cost estimates. Since there was a uniform change in costs for all the secondary roads, the original prioritization/selection of roads is still valid.

9. **Furthermore, despite the cost increase, investing in these 250 km of roads is still economically viable.** In table 3.2, for each road section, the results at the appraisal stage have been compared with those based on the more accurate cost estimates of the detailed design stage. Despite a cost overrun, the EIRR for these roads is at least 18.3 percent, which is well above the 12 percent threshold. Moreover, the total NPV of these roads still reaches up to US\$184 million, though with a considerable decrease from US\$213 million (about 13.6 percent).

**Table 3.2. Comparison of Economic Analysis at Appraisal Stage and After Design**

Road Section	Based on Costs at Appraisal			Based on Costs After Design		
	NPV (US\$, millions)	EIRR	NPV/ Cost	NPV (US\$, millions)	EIRR	NPV/ Cost
Farah - Lashjoyan	8.4	199.0	7.0	7.7	>100	6.4
Qarabagh - Istalif	5.4	89.7	4.5	4.9	>100	4.1
Zar Shakh Pagman - Shakardara District	11.4	87.9	4.5	10.3	>100	4.0
Bangi - Ishkamish Lot 1	63.5	200.0	20.0	56.3	>100	17.8
Taluqan - Namak Aab Road	13.3	80.3	4.5	12.3	>100	4.1
Zaranj to Charborjak	5.1	50.8	1.9	3.8	32.3	0.9
Emaran Kot to Nowkhiz	1.4	30.9	0.9	0.6	18.3	0.3

Road Section	Based on Costs at Appraisal			Based on Costs After Design		
	NPV (US\$, millions)	EIRR	NPV/Cost	NPV (US\$, millions)	EIRR	NPV/Cost
Grishk to Nawzad - Phase 1*	15.7	200.0	7.0	14.5	>100	4.4
Haji Mohammad Shah village (Kandahr-Spen Boldak highway to Zayarat e Zakar Sharef)	9.9	200.0	7.2	9.1	>100	4.3
Pol-e-Kama to Bar Kash Kot	3.7	34.2	1.1	2.3	22.5	0.5
Shibirghan to Darzab road	34.9	119.8	6.4	29.3	>100	5.5
Daykundi to Shahrstan - Phase 1*	0.95	24.4	0.7	1.0	31.1	0.9
Chardara to Qala-e-Zal Lot 1	11.4	73.3	4.4	10.2	91.2	4.0
Safid Sang to Kabul Gardiz Road	3.0	38.0	1.8	2.4	37.6	1.5
Sayed to Feroz Nakhcher	6.8	90.9	5.0	6.2	>100	4.6
Sya Sang to Cement Khana	0.9	64.4	3.2	0.8	96.8	2.9
Kunduz-archi Lot 2	17.6	107.4	5.3	14.3	>100	4.8
<b>Total:</b>	<b>213.4</b>			<b>184.4</b>		

Note: \*These two road sections are evaluated for phase 1 and 2 combined and NPVs are adjusted by length to separate them out by phase.

10. **Under the parent project, a total of 1,038 km of unpaved secondary roads were selected for investment.** However, similar to paved secondary roads, at the implementation stage when site data became available, the cost of gravel roads was found higher than the appraised price. As a result, based on the financial envelope of the parent project, only 621 km of roads from the original 1,038 km had been implemented. Using the new cost estimates, the roads were reevaluated using CBI<sup>10</sup> to assess their economic viability after the cost increase. Upon reevaluation, the overall CBI increased from US\$73 per beneficiary to US\$120 per beneficiary (a 64 percent increase).

11. Using AF, the remaining 387 km out of the original 1,038 km were also reevaluated to assess their economic viability after the cost increase. Upon reevaluation, the overall CBI increased from US\$87 per beneficiary to US\$240 per beneficiary.

12. Unlike cost-benefit analysis for paved roads where projects are normally deemed 'uneconomical' when their EIRR falls below a certain threshold (say 12 percent), there are no well-established criteria for determining the 'opportunity cost' threshold when ranking on the basis of cost-effectiveness (CBI). However, compared with other World Bank rural road projects, the overall CBI of project roads is still found economically justifiable, lower than US\$490 per beneficiary.<sup>11</sup>

<sup>10</sup> The CBI is the estimated cost divided by the estimated number of beneficiaries to establish the cost-effectiveness with respect to the number of beneficiaries served. The method was used in the parent project.

<sup>11</sup> A World Bank project in Morocco, this threshold was set to be US\$490 per beneficiary.

**13. Besides filling the financial gaps for cost overrun, the AF targets scaling up the project impacts by constructing more paved secondary roads, unpaved secondary roads, paved tertiary roads, and unpaved tertiary roads.**

**14. Secondary paved roads.** The same process (as the parent project) was adopted for the identification of new paved roads. As before, roads were first evaluated on a multicriteria assessment that accounted for topology (terrain measured by average vertical gradient), beneficiaries (traffic volume on roads and population served), and costs (hauling distance from construction material). Roads that exceeded the threshold multicriteria assessment score of 70 points out of 100 were then subject to an economic analysis using the Highway Development Model 4. Using this methodology, an additional 138 km of new roads were identified for paving.

**15. Economic analysis is performed to assess whether the economic benefits of the higher standard roads outweigh their economic costs.** The following general assumptions are made when performing the economic analysis:

- (a) The analysis is performed for a 17-year period—2 years for civil works and 15 years of benefits—with 2013 as the base year.
- (b) Project discount rate is assumed to be 12 percent.<sup>12</sup>

**16. The economic benefits of road improvements are assumed to stem from three sources:** (a) value of time savings, (b) reduction in vehicle operating costs, and (c) reduction in GHG emissions.

**17. GHG emissions.** For the cost-benefit analysis, the net GHG emissions are priced at the recommended World Bank Group values to estimate the social cost of carbon. The base estimate starts from US\$30 in 2015 and increases to US\$65 in real terms by 2040—see table 3.3. The low and high paths for the social value of carbon are used to test the sensitivity of the results. Linear interpolation is used to infer the price of carbon for the years between those not reported in the table.

**Table 3.3. World Bank Group-Recommended Social Values of Carbon (US\$)\***

Year	2015	2020	2030	2040
Low	15	20	30	40
<b>Base</b>	<b>30</b>	<b>35</b>	<b>50</b>	<b>65</b>
High	50	60	90	120

*Note:* \*(in real 2014 US\$) Per 1 metric ton of CO<sub>2</sub> equivalent.

**18. For all road sections, traffic is assumed to grow at 3 percent for the first two years, 6 percent for the next eight years, and 3 percent for the last five years.** Table 3.4 presents the length and annual ADT for the new roads that will be paved. Motorized traffic is divided into eight categories to run the analysis: motorbikes, medium cars, pickups, two-axle trucks, three-axle trucks, four plus-axle trucks, three-axle truck trailers, and medium buses.

<sup>12</sup> The recommended discount rate for World Bank projects is now 6 percent, but the more stringent criteria of 12 percent are used, to be consistent with the parent project.

**Table 3.4. Road Length and Baseline Traffic by Road Section**

Road Section	Length (km)	Annual ADT	
		Non-motorized	Motorized
Zaranj City - Sharshila - Kang District	12	585	1,056
Grishk to Nawzad - Phase 2	15	214	957
Daykundi to Shahrstan - Phase 2	11	16	181
Qala-e-Now to Abkamari	16	521	823
Zarghon Shahr - Waza Khaw Lot 1 and 2	21	32	325
Noburja to Rashidian and Nawar	10	30	250
Dare-e-Pich to Chapa Dara	28	750	923
Nili to Sharistan	25	25	400
<b>Total</b>	<b>138</b>	<b>2,923</b>	<b>5,818</b>

19. Cost-benefit analysis indicates that the project achieved a favorable EIRR with and without the inclusion of GHG emissions benefits. Even without the inclusion of GHG emissions benefits, the NPV for all road sections is US\$90.2 million at the discount rate of 12 percent and the minimum EIRR for any road section is 28.6 percent (well above the 12 percent threshold). When GHG emissions are taken into account by using base prices for carbon, the NPV increases by 2.4 percent to US\$92.5 million.<sup>13</sup>

**Table 3.5. Economic Analysis by Road Section**

Road Section	NPV (US\$, millions)	EIRR
Zaranj City - Sharshila - Kang District	11.2	>100
Grishk to Nawzad - Phase 2*	14.4	>100
Daykundi to Shahrstan - Phase 2*	1.0	31.2
Qala-e-Now to Abkamari	9.1	>100
Zarghon Shahr - Waza Khaw Lot 1 and 2	3.2	28.6
Noburja to Rashidian and Nawar	1.7	28.7
Dare-e-Pich to Chapa Dara	40.6	>100
Nili to Sharistan	8.9	40.7
<b>Total:</b>	<b>90.2</b>	<b>&gt;100</b>

Note: \*These two road sections are evaluated for phase 1 and 2 combined and NPVs are adjusted by length to separate them out by phase.

20. **Sensitivity tests.** The analyses have been carried out to test the robustness of the economic analysis results. First, the robustness was tested by varying the traffic volume and construction costs—a 25 percent reduction in traffic volume and a 25 percent increase in cost. Second, the robustness was tested by altering the price of carbon—low, base, and high prices discussed earlier. In all instances, it has found the NPV for the project roads positive at a 12 percent discount rate. The NPV ranges from US\$60.1 million (25 percent increase in cost and 25 percent decrease in traffic volume; low carbon pricing) to US\$93.8 million (base cost and traffic; high carbon pricing).

<sup>13</sup> Actual GHG emissions savings are higher as the GHG emission calculations are based on five of the eight roads (it excludes Noburja to Rashidian and Nawar [FT], Dare-e-Pich to Chapa Dara [MT], and Nili to Sharistan [FT]).

**Table 3.6. Sensitivity Analysis—NPV (US\$, millions)**

	<b>Low Carbon Prices</b>	<b>Base Carbon Prices</b>	<b>High Carbon Prices</b>
Base cost and traffic	91.5	92.5	93.8
25% increase in cost and 25% decrease in traffic volume	60.1	60.6	64.3

21. **Secondary unpaved roads.** Priority has been given to the roads in Wakhan Corridor to improve the road network coverage. Through the network planning study under the parent project TA component, connectivity of the country’s major highways and secondary roads has been analyzed. It has been discovered that Wakhan Corridor and Nuristan Province have no basic connectivity, that is, no vehicle passable road, to the country’s transport network. Some secondary roads of Nuristan Province were considered in the parent project. During implementation, some selected project roads have been taken by other donors or government own funds; therefore, the road connecting two districts in Wakhan Corridor that are on the priority list is therefore taken into account in the AF as substitution to the road that was taken by other funds. Therefore, the economic analysis of the road is carried out as ‘new’ road although it is selected in the original 1,000 km scope. The CBI of the proposed 30 km unpaved road in Wakhan Corridor is US\$510 per beneficiary, of which the figure is found higher than those of roads located in normal places. However, the road has been selected through the principles set in the parent project and CBI is not the only indicator for selection. Technical analysis shows that the road is located in the difficult terrain in one of the world’s highest mountains and other road alignment options are not possible.

22. **Paved and unpaved tertiary roads.** According to available budget for the AF of the ARAP, the target for tertiary roads has been scaled up from 1,300 km of gravel road to 1,454 km gravel surface roads and bridge construction raised from 1,600 meter to 2,050 m. The strategy of the program is to implement gravel surface roads for those provinces where accessibility rate is very low, to improve connectivity and to expand the rural roads network coverage. Moreover, upgrading of gravel roads to paved roads in selected area is also included in the AF as a pilot to improve agriculture supply chain and therefore to promote jobs in the agriculture sector.

23. **For selection purposes, tertiary roads were divided into three buckets: (a) section of unpaved roads and bridges, (b) bridges not included in bucket (a), and (c) paved roads.** The selection criteria are largely similar to the parent project.<sup>14</sup> Bridges were initially considered part of the road on which they were located. Bridges that were not selected as part of roads were then subjected to different selection criteria that were devised for bridges only. The criteria used for the three buckets are described briefly:<sup>15</sup>

<sup>14</sup> Unpaved and paved roads were previously considered ‘indirect/direct requests from the community’, and this has been replaced with ‘farm to market access’. Paved roads were previously considered ‘access to social centers’, and this has been replaced with ‘area of farm to be connected to markets’. For bridges ‘farm to market access’ is added to the criteria for selection.

<sup>15</sup> Unpaved and paved roads were previously considered ‘indirect/direct requests from the community’, and this has been replaced with ‘farm to market access’. Paved roads were previously considered ‘access to social centers’, and this has been replaced with ‘area of farm to be connected to markets’. For bridges, ‘farm to market access’ is added to the criteria for selection.



- (a) **Unpaved roads and bridges.** Criteria include population served, traffic volume, farm to market access, access to economic opportunities, access to social centers, and the current level of accessibility.
- (b) **Bridges not included in (a).** Criteria includes population served, traffic volume, and farm access to market.
- (c) **Paved roads.** Criteria include population served, traffic volume, access to economic opportunities, and area of farm to be connected to markets.

24. **Based on these criteria, a ‘multi-criteria prioritization’ scheme was designed to assess a long list of 1,931 km of unpaved roads, 622 km of paved roads, and 3,428 m of bridges in 34 provinces (on a scale of 0 to 100).** In addition, linking the paved tertiary road to a paved secondary/main road is essential. Roads scoring the highest points were chosen for further prioritization on the basis of CBI. Thus, the final section was based on both the multi-criteria prioritization and CBI.

25. **Based on the methodology described earlier, unpaved roads, paved roads, and bridges were short-listed from the long list of candidates.** About 197 km of unpaved roads, 140 km of paved roads, and 977 m of bridge have been longlisted.<sup>16</sup> Analysis of this long list of roads shows that the CBI for new paved and unpaved and paved tertiary roads is reasonable. For the unpaved tertiary roads, the average CBI is 62 per beneficiary. For the paved tertiary roads, the average CBI is 44 per beneficiary. The lengths of roads and bridges selected are more than the target for the AF.

26. **For paved tertiary roads, those located in the areas of the country famous agriculture products and to be used to transport fruits, vegetables, and fragile porcelain products are given highest priority.** The value losses of such products during transportation are sensitive to road roughness,<sup>17</sup> especially if they are transported on unpaved roads and without proper packaging. Research has estimated the losses for vegetables such as lettuce, cabbage, and tomatoes to be 28 percent, 31 percent, and 11 percent, respectively, when being transported for an hour. Similarly, the damages for pears, plums, strawberries, and grapes have been estimated to be 24 percent, 9 percent, 40 percent, and 30 percent, respectively, over the same period. Paving of this kind of tertiary roads has significant benefits for agriculture productivity.

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<sup>16</sup> The target for the AF is 134 km of unpaved roads, 105 km of paved roads, and 611 m of bridges.

<sup>17</sup> By contrast, some agriculture products such as wheat are not expected to suffer from any significant damage during transportation.

## Annex 4: Fiduciary (FM and Procurement) Arrangements

1. **Overall fiduciary assessment.** The proposed AF will be implemented by the MRRD and MPW through the respective PIUs set up under the ongoing project, with overall coordination provided through the NCU in the MOF. Based on an assessment of the arrangements in place and proposed risk mitigation measures resulting from a few changes to the arrangements, the overall fiduciary risk rating remains Substantial.

### Financial Management

2. **The FM arrangements and performance under the current project have been reassessed and found to be satisfactory.** The key change to the FM arrangements is shifting the project from Statement of Expenditures (SOE) to Interim Unaudited Financial Report (IUFR) based disbursement. Other change is on funds flow and FM consolidation responsibilities. This is on account of the transition from the IC (UNOPS) and mainstreaming all activities through the implementing agencies. The overall responsibility for FM will still rest with the Finance Directorates of the MRRD and MPW. However, the day-to-day activities will be carried out through the PIUs. The PIU FM staff will closely work with the Finance Directorates in carrying out the functions.

3. **The key FM risk as a result of the change is timely processing of project payments through the Designated Accounts (DAs) (and direct payments) in the absence of the float account and transition from the IC arrangement.** While almost all World Bank-funded projects in Afghanistan follow the centralized system of payments, there are sometimes delays due to the lengthy processing cycle on part of both the implementing agencies and the MOF. In the past one year, the MRRD and MPW in discussion with the MOF's Budget and Treasury Departments have gradually addressed the bottlenecks through a number of measures (for example, bulk allotment for contracts and streamlining the system within the MRRD/MPW). The MOF has established service standards for processing of allotments and payments, and there is strong commitment on the part of the MOF to adhere to these standards. The MRRD and MPW on their part will need to ensure that the documentation sent to the MOF is complete and free of errors. This requires efficient oversight and management on the part of the MRRD/MPW, as well as effective liaising with the MOF. Internally, the MOF has been bringing about positive changes gradually for better service delivery. This continues to be work in progress and the World Bank is engaging closely with the implementing agencies as well as with the MOF to streamline/simplify the processes.

4. **Staffing.** FM staffing in the MRRD and MPW PIUs is adequate under the ongoing project, and no additional staff are proposed at this stage. The FM staff will have dual reporting lines: (a) to the head of the PIUs for all project-related matters and (b) to the head of the Finance Directorate. Staffing will be reviewed on a periodic basis and any additional staffing will be considered on an 'as needed' basis. With the transition out of UNOPS, the coordination of FM matters and consolidation of quarterly IUFRs will be done through the NCU in the MOF. To enable the NCU to perform this role, a Finance Officer will be hired under the NCU. The terms of reference for the position has been reviewed by the World Bank and the candidate has been hired.

5. **Budgeting.** According to the standard practice, the project will follow MOF guidelines for budget preparation. Project budget will be based on the procurement plan and the annual work plan. The annual consolidated budget will be broken down into quarters (and by implementing agency) to facilitate budget monitoring. The responsibility to maintain a

consolidated project budget will rest with the NCU. Actual expenditures will be monitored against quarterly budgets separately for the original and AF grants and will be reported to the World Bank. The MOF will ensure that a temporary one-twelfth budget will be made available to the project at the beginning of the year in the event of delay in approval of the new budget.

6. **Accounting.** All accounting is centralized at the MOF in the Afghanistan Financial Management Information System. Subsidiary books of records such as bank book, petty cash, contract register, and so on will continue to be maintained by the PIUs. Segregated books of records for the IDA and ARTF grants will be maintained. Each of the provincial management units will maintain its own cashbook for operational cash and will account and report to headquarters on a monthly basis. The project has a Financial Management Manual that was revised and approved in August 2015. This will be updated on a need basis to reflect changes in the arrangements.

7. **Reporting.** Consolidated quarterly IUFRRs will continue to be submitted for the project. The reporting under the ongoing project is timely and in form/ substance acceptable to the World Bank. The IFR reporting too will be segregated for IDA and the ARTF. The responsibility to submit the consolidated (for the MRRD and MPW) quarterly IFRs within 45 days from the end of the quarter will rest with the NCU. To enable the NCU to meet the deadline and quality requirements, the PIUs will submit the individual IFRs to the NCU within 30 days from the end of the quarter.

8. **Funds flow.** Project funds will flow through segregated DAs for the MRRD and MPW and for each funding source. Regarding the AF from the ARTF, the funds will be added under the existing ARTF grant. As such, the existing DAs will continue to be used and no new DAs will be set up. The Project will follow report based disbursement arrangements. Advances into the DA will be provided for six months by the Bank on the basis of projections/ forecast for the first two quarters. Subsequent IUFRRs will document expenditures against the advance received and will provide forecast for the following two quarters, on the basis of which the amount of funds to be disbursed will be determined. The funds provided into the DA would be used to meet the project's eligible expenditures. For large foreign currency payments, the project will use the direct payment method of disbursement. Operational cash to the provinces will be allowed under the AF, according to increased limits agreed recently under the original financing. Operational cash to the provinces will be transferred by cash/hawala. Appropriate procedures for accounting, reporting, custody, approvals, and settlement will be documented in the Financial Management Manual and will be monitored periodically.

9. **Retroactive financing.** As the current IDA grant has disbursed almost 100 percent, the MOF has provided bridge financing of US\$30 million for the ARAP activities until the time the AF is approved. Therefore, retroactive financing up to US\$30 million will be provided under the ARTF AF grant for payments made before the grant signing date, but on or after April 1, 2016.

10. **Internal controls.** The project follows the centralized payment mechanism applied in Afghanistan and controlled by the MOF. Internal controls are adequate both at the central and implementing agency levels. There is adequate segregation of duties. World Bank and advance reconciliations will be done on a monthly basis by the respective implementing agencies and monitored by the NCU. All these controls have been reviewed and found satisfactory. The Financial Management Manual will be shared with all project FM staff to ensure adherence. Internal audit for the project will be carried out by the Internal Audit Unit of the MOF.

11. **External audit.** Annual project audit for all World Bank-funded/administered projects is done by the Supreme Audit Office of Afghanistan with TA from an internal audit firm. The financial statements for the audit are prepared by the MOF using the Afghanistan Financial Management Information System. The audited financial statements are due within six months from the end of the fiscal year (December 20). The latest audited financial statements for FY1394 (year ended December 21, 2015) were submitted within the due date and the auditors issued an unqualified opinion.

12. **There are no overdue audit reports, overdue IFRs, or ineligible expenditures under any of the active or closed projects implemented by the MRRD or MPW.**

13. **The implementation support will include monitoring of fiduciary performance based on identified indicators, review of IFRs and audit reports, review compliance with legal covenants, review progress on agreed actions, and review of FM risks.** In particular, the focus will be on timely processing of payments through the DAs according to established service standards in the MRRD/MPW and the MOF, periodic reconciliations, and robust management of operational cash.

#### **Procurement Plan**

14. **A procurement plan for the AF has been uploaded in the World Bank's Systematic Tracking of Exchanges in Procurement system.** In the procurement plan, for the significant amount of secondary roads, which were previously held back by the cost overrun and are expected to be sponsored under the AF, the tendering process has been started to catch up with the coming construction season of 2017. Any potential payment that might be caused before the AF is approved will be covered under the retroactive financing arrangement.

#### **Fiduciary Arrangement for Component D Contingency Emergency Response**

15. **Procurement arrangements.** Execution of funds through the Contingency Emergency Response will be procured based on 'Guidance Note: Rapid Response to Crisis & Emergencies - Streamlined Procurement Procedures June 2009', which is implemented under OP/BP 10.0, Rapid Response to Crisis and Emergencies.

16. **Force Account.** In emergencies, when construction firms are unlikely to bid at reasonable prices because of the location of, and risks associated with, the project or a certain government agency has a sole right in certain type of work (for example, railway track work and high tension transmission cables), a Force Account may be used for repair/reconstruction using the borrower's own personnel and equipment or a government-owned construction unit, in accordance with paragraph 3.9 of the Procurement Guidelines.

17. **Financial management.** OP/BP 10.0 for emergency lending procedures will govern FM for the component. An ex post independent audit may be requested to be carried out by the Office of the Auditor General to evaluate disbursements for eligible expenditures under this component. Records or summary reports of expenditure will be maintained. The two PIUs will not use critical goods financed under this component for military or paramilitary purposes. If the World Bank determines that the proceeds of the grant were used to make a payment for either (a) ineligible expenditures or (b) goods eventually used for military or paramilitary purposes, the Government will reimburse the amount of such payments or the costs of these goods. All amounts so refunded to the World Bank will be subsequently cancelled by the World Bank.

18. **Disbursement under Component D will be governed by OP/BP 10.0 for emergency lending procedures.** Disbursement for eligible expenditures will include advances to the DAs, direct payments to suppliers, reimbursements, and special commitments. For critical goods, the World Bank will reimburse expenditures made on the basis of (a) evidence of the purchase of critical goods (for example, bills of lading) certified by the recipient's customs department for imported goods and the Accountant General as well as the MPW and MRRD for locally procured goods; (b) evidence of payment for critical goods (for example, receipts or retirement documents with respect to letters of credit, payment vouchers); and (c) letters of comfort or affidavits from the ARAP and the Auditor General of Afghanistan certifying the retroactive, current, or expected use of the critical goods for Component D, including details of the critical goods.

## Annex 5: Synergizing Job Creation in the Additional Financing

### Updates of Country and Sector Context

1. **The objectives of the AF are to cover the financial gaps of the parent project and extend the network coverage to enable a larger portion of population to have all-season accessibility.** The activities will be mainly labor-intensive public works and this makes a significant contribution to releasing the pressure on the Government to create job opportunities.

2. **The Government’s ‘Jobs for Peace’ initiative.** High population growth and a youth bulge, with 400,000 entrants into the labor force each year, are presenting Afghanistan with an unprecedented job challenge. Unemployment and underemployment stand at about 22 percent and 46 percent, respectively, and have significantly increased over the past several years (up from 8.1 percent and 22.6 percent in 2011) because of stagnating growth and a deteriorating security environment. To counter the risks of the spreading insurgency and continued economic stagnation, the Government proposed a ‘Jobs for Peace’ initiative aimed at stimulating aggregate demand and job creation in October 2015. The initiative suggested several interventions, mainly anchored within the existing community-based mechanisms and consisting of public works, social housing, and conditional cash transfers and vouchers, which would require over US\$1 billion over the next 24 to 30 months. The Government recognizes the need to send a strong signal to the population to restore confidence in the National Unity Government. The initiative also reckons that growth and service delivery and governance are the key to tackle the job crisis.

3. **The jobs crisis requires a multifaceted response along four tracks:**

- (a) Short-term 'emergency-type' actions to stimulate private sector activities and household consumption by increasing public demand for local goods and services, as well as by direct cash transfers
- (b) Actions to sustain the model and therefore, ensure continuity of service delivery, including in areas under insurgent control
- (c) Immediate actions and policy reforms in support of private sector-led growth
- (d) Confidence-building measures in governance and fiscal management to show improvement in allocation and execution efficiencies, policy stability, and commitment to fighting corruption

4. **Citizen’s Charter is a new compact between the state and citizens to ensure Citizens Development Rights.** The purpose of the Charter is to set a threshold of core services, to be equitably provided to all communities, which will support the underserved poor to receive a basic-level of services to participate productively in the arenas of economic growth. The Citizen’s Charter intends to improve service delivery, provide greater responsiveness by the Government to the people, and increase the level of public satisfaction with services. Rural access is one of the basic-level services recognized in the Charter. Moreover, “realizing self-reliance” is another important Government vision set in the Charter to “restore security and political stability, root out corruption, achieve fiscal sustainability, support economic growth and job creation, and ensure citizens’ rights to development.”

5. **Significant improvements of road network connectivity and accessibility have been achieved in the past decade.** All county provincial capitals and more than 97 percent of district centers (388 out of 398 district centers) have been accessible with four-wheel motor vehicles, except for two isolated areas (10 district centers), namely Wakhan Corridor of Badakshan and most of Nuristan Province, because of their difficult terrain. Most of the 45,000 villages are accessible via four-wheel vehicle roads except for about 4,800 villages outside of the 2 km coverage.

6. **Sustainability of the network improvement still remains challenging.** Besides the persisting challenges of network connectivity and accessibility, 49 percent of roads are still not serviceable throughout the year. The Government is focused on O&M to sustain connectivity and accessibility. Moreover, vehicle ownership has also increased exponentially over the past decade; hence, a significant proportion of unpaved secondary roads cannot cope with the heavy traffic (with ADT above 500 vehicles per day) and need to be upgraded to higher standard paved roads, for example, the unpaved roads connecting the four provincial centers.

7. **The transport sector is one of the major contributors to job creation.** Road construction and maintenance directly creates a large number of jobs for low-skilled workers in the project areas. In Afghanistan, about 25 percent to 30 percent of road construction costs are for labor, and about 80 percent of labor costs are for unskilled or low-skilled labor who are hired locally in the area of the road. Moreover, improved accessibility generates job opportunities in both upstream and downstream value chains. First, improved rural connectivity increases productivity and competitiveness of farm and nonfarm enterprises and allows farmers to move from subsistence agriculture to commercial production. In South Asian countries, improved rural connectivity increased average yield of cash crops (42 percent), value of agricultural basket (8–22 percent), output prices (2–3 percent), and number of enterprises, particularly in the nonagricultural sector. Second, improved rural connectivity reduces poverty. Evidence from South Asian countries also shows that, it improved full-time employment (20 percent more)/agricultural wage (11 percent) and nonagricultural wage (19 percent)/average monthly household income (close to 60 percent). Lastly, it improved rural connectivity supported investments in human capital, with an increase in school enrollment, especially with children under 16 years (10 percent) and secondary school enrollment (14 percent for boys and 20 percent for girls) as well as access to sanitation and hygienic behavior.

8. **This AF operation is an appropriate financing instrument to address the job creation needs of the Government.** Given that the parent project is running smoothly and there are plenty of road sections that have been surveyed and designed but yet to be financed, the AF can immediately put these high prioritized roads into construction stage and create low-end jobs locally. Second, upon the requests of the Citizen's Charter, the two line ministries, namely the MPW and the MRRD, are taking actions on sector reforms, for example, enhancement of private sector involvement in road O&M and a 'self-reliance' policy to assume full implementation services. The AF operation would be able to sponsor these actions to improve the efficiency of service delivery and sustain and ensure the continuity of service delivery. Third, the AF also targets improvement of the entire 'door-to-door' road services instead of road infrastructure construction only, and this will bring about cross-sector opportunities to address broader-level job creation and economic development issues, like enhancing the transport service supply chain to stimulate the development of rural mini/small enterprises. Fourth, the project deals with overall network-wide issues and the World Bank can also use its convening power. This can leverage support from other donors for the 'Jobs for Peace' initiative.

9. **Previous experience and lessons show that comprehensive job intervention measures, especially improvement of transport value chains, are critical to create job opportunities, sustain job opportunities, and eventually speed up the growth for the sector and secure the service delivery efficiency.** The ARAP was set up as a follow-on project to the series of World Bank-supported projects implemented in the last 10 years and to the Government’s NRAP. The NRAP has been one of the Government’s national priority programs with a broader vision of enhancing human security, equitable growth, and integrating the rural economy to the regional market through the provision of sustainable rural access to basic services. Back in 2001–02, the NRAP was conceived as an employment provision scheme with a view to creating stability and providing the transition Government visibility among the Afghan population. Without targeting sector developments and improving the efficiency of service delivery, so-called job creation measures will not be supportive to resolving job crises in the longer term. Other recommendations from the previous operations include the following:

- (a) Improvements of network planning to target national economic development needs
- (b) Unlocking bottlenecks to involve the private sector (especially micro and small enterprises) and communities in O&M operations, especially major road O&M
- (c) Uplifting the transport service value chain to both upstream and downstream to facilitate job creation outside the transport sector

10. **Comprehensive job intervention measures are therefore categorized as the following:**

- (a) Immediate actions to extend network coverage and to enhance network service to reduce inequality and vulnerability in market/service access
- (b) Raising productivity of farmers and micro, small, and medium enterprises through value chain development for inclusive employment
- (c) Immediate measures to tackle the gaps of O&M value chain to stimulate private sector involvement, including policy enhancement measures and upgrading maintenance practice
- (d) Institutional support, including capacity building and policy development, to enhance the Government’s ‘self-reliance’ and private sector involvement
- (e) Piloting information and communication technology (ICT) connectivity via road connections to set up ICT platforms (for example, e-commerce) to expand job opportunities
- (f) Other TA support for vocational training, sector reform, and institutional developments

### **Job Creation as a Significant Co-benefit of Additional Financing**

11. The original PDO, which is to “enable the rural communities to benefit from all-season road access to basic services and facilities,” will remain unchanged in the AF, although the design of the scale-up activities will take the ‘Jobs for Peace’ agenda into account. The inclusion of the ‘Jobs for Peace’ initiative is based on the following:



- a. The job crisis relates to the demographic structure and resolution of the crisis can only come from improvements in “economic growth” and “service delivery.”
- b. Including the ‘Jobs for Peace’ initiative in the scale-up activities is expected to increase the pace of project implementation and to improve network planning to target the connectivity and accessibility crises.
- c. Job intervention measures, like designing more labor-intensive engineering solutions, will not change the overall objective of improving road service.
- d. Without the ‘Jobs for Peace’ initiative, the PDO will have to be achieved and the project activities will also require a large amount of labor to be involved.

12. Table 5.1 shows the identified priority job intervention measures in each line ministry to improve rural access. More than 35 job intervention measures have been identified, with highlighted leading measures for each line ministry. Network coverage, transport service value chain improvements, and O&M are the most expensive—all three of these aspects need to be equally covered.

Table 5.1. Identification of Job Intervention Measures in Each Project Component

Job intervention measures	(a) Immediate actions to extend network coverage and to enhance network service to reduce inequality and vulnerability in market/service access	(b) Raising productivity of farmers and micro, small, and medium enterprises through value chain development for inclusive employment	(c) Immediate measures to tackle the gaps of O&M value chain to stimulate private sector involvements, including policy enhancement measures and upgrading maintenance practice	(d) Institutional support, including capacity building and policy development, to enhance the Government's 'self-reliance' and private sector involvements	(e) Piloting ICT connectivity via road connections to set up ICT platforms (for example, e-commerce) to expand job opportunities	(f) Other TA support for vocational trainings, sector reform, and institutional development	Remarks
MPW: (for secondary roads)	<ul style="list-style-type: none"> <li>Improving Government network planning system targeting the needs of national economic development strategy</li> <li>Extension of secondary road network to remote areas</li> <li>Upgrading secondary roads to accommodate increased traffic demands</li> </ul>	<ul style="list-style-type: none"> <li>Building/upgrading connections to targeted agriculture product areas and district centers</li> </ul>	<ul style="list-style-type: none"> <li>Upgrading of maintenance technologies to lower entry barriers of private sector involvements</li> <li>Mainstream road asset management systems in major road maintenance agencies</li> </ul>	<ul style="list-style-type: none"> <li>Support to the MPW's reform of commercializing project implementation services</li> <li>Enhancement and mainstreaming of QA/QC systems</li> <li>Code, standards, or specifications for quality inspections</li> <li>Practice code for road asset acceptance to O&amp;M;</li> <li>Mainstream and enhancements of project cost estimation system</li> </ul>	<ul style="list-style-type: none"> <li>Facilitate any cable works within the right-of-way of major and secondary road networks</li> </ul>	<ul style="list-style-type: none"> <li>Support on the MPW working with other education institutes, for example, universities, to provide trainings to local communities, private sectors</li> <li>Assistance for domestic engineers to get international professional certificate</li> <li>Internship/apprenticeship for young engineers and unskilled workers</li> </ul>	—
MRRD (for tertiary roads)	<ul style="list-style-type: none"> <li>Improvements to tertiary roads in line with the improved secondary road corridors to increase network coverage</li> </ul>	<ul style="list-style-type: none"> <li>Working with other ministries and other MRRD teams and identifying transport service needs for local products</li> <li>Making proper asset management arrangements with local private sector</li> <li>Improvements to tertiary road services, including loading/unloading and storage facilities</li> </ul>	<ul style="list-style-type: none"> <li>Setting up of mainstream road asset management systems for tertiary roads</li> <li>Setting up of asset inventory system for the MRRD and its provincial directorates</li> </ul>	<ul style="list-style-type: none"> <li>Support to the MRRD's reform of mainstream PIU into the Government structure</li> <li>Practice codes for road asset acceptance to O&amp;M (tertiary roads)</li> </ul>	<ul style="list-style-type: none"> <li>Working with the MCIT, AfTelecom, local communities, and local private sector to carry out feasibility study</li> <li>Making proper asset management and service charging mechanism with local private sector</li> <li>Improvements to physical infrastructure and provide trainings</li> </ul>	<ul style="list-style-type: none"> <li>Enhancements of the IRRD to expand its training service to local communities</li> </ul>	—
MOF NCU	—	—	<ul style="list-style-type: none"> <li>International seminars, trainings, or studies on asset inventory and O&amp;M technologies and policies</li> </ul>	<ul style="list-style-type: none"> <li>Overseas training or studies on QA/QC and project management mechanisms</li> </ul>	<ul style="list-style-type: none"> <li>TA on e-commerce for the IRRD</li> <li>Seminars on e-commerce</li> </ul>	<ul style="list-style-type: none"> <li>TA on monitoring and evaluation of the NRAP</li> <li>Fuel study</li> <li>Rural infrastructure-funding mechanism</li> </ul>	—

Note: MCIT = Ministry of Communications and Intelligent Technologies (MCIT)

13. **The AF is needed first and foremost to cover the financing gap of the project.** Without closing the financing gap, which is estimated at US\$69 million, or 21 percent of the original project funding amount, the planned physical project outputs cannot be fully achieved and the original PDO indicators can only be partially achieved. Furthermore, the financial gap comes from the secondary road network, which is critical for network coverage improvements and therefore, for the reduction of the inequality of job, market, and service access. Hence, within the confirmed US\$105 million ARTF, the US\$69 million financial gap from the revised cost estimation as the first priority will have to be covered.

14. **The increase of paved road networks in the AF also supports agriculture products and rural development and thus, creates more job opportunities in rural areas.** The initially selected agriculture products and development areas, namely Jalalabad Province fruit products, Bamiyan Valley and Logar Province porcelain products, are sensitive to transport services or accessibility, and transport services are one of the identified bottlenecks on the product value chains. Moreover, under the project bridge construction, optimizing the design of combining the bridge with the mini-hydro option will also be investigated to provide complementary benefits to the local population and achieve fiscal sustainability of asset management. Working with the ongoing AREDP and other rural enterprise promotion projects, the AF will provide support to exploring new mechanisms for the beneficiary enterprises in the road O&M.

15. **Building on community-based O&M and the successful survey of road assets in the parent project, the AF will extend O&M support to the line ministries.** The MPW is responsible for the country's national highways and secondary road networks and the MRRD is the rural infrastructure and service facilitator for villagers. O&M support to the MPW is therefore focused on improving the capacity of selected provincial departments and lowering barriers to involve micro and small rural enterprises in O&M, while support to the MRRD is on assisting provincial departments to set up the tertiary road inventory system and supervise the CDCs and beneficiary enterprises on O&M.

16. **The AF will support commercialization of project implementation services.** Having seen the significant improvements in the implementation capacity of line ministries, the commercialization policy will further improve the consulting market, open up the consulting market for private firms, and improve the resilience of service delivery capacity. The AF will support Government policy research on road sector reform, the PIU reform plan, and research seminars on international experience.

17. **It has become apparent that the road construction market faces a shortage of skilled labor, which negatively affects the 'Jobs for Peace' efforts and also affects the quality of road works.** The AF will support the MPW in enhancing its vocational training program for road professionals, while supporting the MRRD's IRRD to provide skills trainings to the villagers living in project road areas.

## Annex 6: Project Area Map

