1. Key development issues and rationale for Bank involvement

After opening up to the outside world in the 1960s, Bhutan has made significant socioeconomic progress. As a result of prudent macroeconomic management, rational exploitation of its hydropower resources and substantial support of international development agencies, the country has built up physical and social infrastructures and experienced strong economic performance with GDP growth at 6 percent per annum and nearly 8 percent over the past five years. Sustained growth has led to increased GNI per capita from US$470 in 1999 to US$760 in 2004.

Being a landlocked country, Bhutan substantially depends on an efficient and reliable road network in its socio-economic development. The total road network currently comprises 4,153 km (62 percent paved) and more than 4,300 km of mule tracks. Despite significant progress in the road sector, the lack of or poor rural access is considered one of major bottlenecks in the country’s development. Due to the formidable topography and wide dispersion of population across small, remote, rural settlements, 21 percent of the Bhutanese households live within one to four hours of walking distance from the nearest all-season road, and another 21 percent live within more than four hours\(^1\) and, thus, are poorly connected to basic social and economic services, which are mostly concentrated in urban centers. In addition, more than a third of the road network is in very poor condition and a significant majority in poor condition by international standards.

The country’s transport sector strategy, similar to other national strategies and programs, is framed by Bhutan’s Development Vision, which recognizes maximization of human happiness, not economic progress, as an overarching goal. The development strategy for the transport sector has three broad objectives: (i) to facilitate balanced regional and urban development, support internal trade and commerce, and integrate the relatively isolated central and eastern regions with the rest of the country; (ii) to reduce the cost of international transport and improve logistics of

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\(^1\) Bhutan’s Office of Census Commissioner: http://www.bhutancensus.gov.bt/Fact_sheet.pdf
international trade and commerce; and (iii) to improve rural accessibility (especially access to markets, employment, and education, health and social services) in an environmentally sustainable and socially responsible manner.

Although the achievement of the rural accessibility improvement objective is constrained by several challenges - the country’s rough and fragile terrain, obsolete road construction technology and practices, and insufficient resources - the Rural Access Project (RAP-I), which is to close on June 30, 2006, has succeeded in coping with these challenges. RAP-I has successfully constructed 129 km of roads, built and strengthened the capacity of the public road sector, supported piloting of community-based contracting for road maintenance works and introduced environment friendly road construction methods. The proposed Second Rural Access project (RAP II) is a follow-up “repeater” operation and it is designed to replicate the positive lessons and good practices from RAP-I in three new districts of the country. RAP-II is in a good position to follow up applying similar approaches and to achieve its objective of rural access expansion, which is also assigned a high priority by the PRSP/Ninth Plan 2 and CAS 2006-09 3.

The Asian Development Bank is another main development partner supporting the RGOB with rural access improvement. However, due to the large unmet demand, the World Bank support is needed to fill in the financial gap.

2. Proposed objective(s)

The project development objective is to provide all-season road access to targeted rural communities. The project will focus on three Dzongkhags: Wangdue, Dagana, and Pemagatshel, where the average distance and walking time from a beneficiary village to an all-season road ranges between 4-54 km, or 1 to 15.5 hours.

Outcome indicators. To monitor and evaluate the progress of the project implementation, the following indicators will be used:

(i) targeted beneficiaries will be brought to within 2 km or 30 minutes of walking distance to all-season road;
(ii) travel time by targeted beneficiaries to economic and social centers will be reduced by 50 percent;
(iii) the number of trips taken by beneficiaries to key economic and social centers will increase by 50 percent; and
(iv) price of key consumption and production commodities at beneficiary villages will be within 10 percent of the price at the nearest town.

Baseline data for the above indicators has been collected as part of the socio-economic survey and will be part of the Project Monitoring Framework to be agreed by appraisal. The indicators

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2 The PRSP/Ninth Plan (2002-2007) outlines an integral path of change guided by Bhutan’s unique and home-grown development vision: Gross National Happiness, which is underpinned by four pillars that further define the effort to balance spiritual and material advancement—sustainable socioeconomic development, conservation and sustainable use of the environment, promotion of culture, and good governance.

3 CAS 2006-09 was released on November 18, 2005.
would be monitored during, and after project implementation through similar repeat socio-economic surveys. There will be two additional surveys: one during Midterm and the other by project closing.

3. Preliminary Description

To meet the project development objective and outcomes specified, the proposed RAP II will comprise two components: (a) Physical Component, and (b) Institutional Component:

A. Physical Component (Total Cost: US$ 7.44 million)

Construction of New Feeder Roads (US$ 6.94 million). The construction of three feeder roads of approximately 75 km length total will be undertaken in Wangdue, Dagana, and Pemagatshel Dzongkhags:

i. Jangchucholing-Tashidingka Road (20.3 kilometers) in Wangdue Dzongkhag;
ii. Drujeygang-Balung road (42.5 kilometers) in Dagana Dzongkhag;
iii. Khothakpa- Khar-Tsebar- (10 kilometers) in PemaGatshel Dzongkhag.

The three proposed roads were selected from RGOb’s 20-year Road Master Plan and are part of the Ninth and Tenth plan development programs.

Improvement of Existing Feeder Roads (US$ 0.17 million). Improvements to upgrade the condition of roads to all-season standards and ensure their sustainability will be carried out on 15 km of roads in the participating Dzongkhags. The improvement works will include graveling, construction of retaining walls, cross drainages, drainage structures and bridges.

Privatization of Routine Maintenance (US$ 0.33 million). The proposed project will support on a pilot basis the DOR’s initiative of the privatization of its routine road maintenance activities through a long-term, performance based maintenance contract with the National Work Force (NWF). This will allow DOR to reduce costs and improve the productivity of NWF and help in converting the NWF into small enterprises that will be paid on the basis performance-based contract rather than daily wages. In the first instance, the maintenance of the completed RAP-I roads will be contracted out to NWF on a long-term, performance basis where community contracting is not feasible. The proposed project will finance the routine maintenance costs, and provide implementation support under the Institutional Development Component (see the next component).

B. Institutional Development and Implementation Support (US$ 0.49 million)

Organizational Development for the newly established Investigation and Development Division (IDD). The IDD was established last year with a mandate to promote and mainstream technical innovation and support the professional development of the DOR. The proposed project will support IDD in the following areas:

• Monitoring and Reporting,
• Data collection for traffic and road condition surveys,
• Quality Assurance,
• Work, procurement and Contract Management system,
• Technical innovation and engineering aspects, and
• Environmental Management

*Human Resource Development and support to training institutions and universities.* As part of the Human Resource Development strategy for the road sector, the proposed project will provide training to trainers and work with local training institutions or universities to institutionalize training in several areas of road planning, design and construction, environmental management, as well as contract management and procurement. In addition, short-term and long-term training to DOR staff and contractors will be supported under the proposed project.

*Maintenance Contracting.* DOR has piloted maintenance contracting with communities in one of the RAP-1 road (Dakpai-Buli road). In addition, where community workers are not available, the DOR wishes to pilot privatizing its Force Account through long-term, performance-based contracting with the National Work Force. The proposed project will provide technical assistance, social mobilization and maintenance planning and supervision to implement the two pilot contracting modalities.

*Project Implementation Support for Project Coordination Unit in Thimphu and Project Management Units in the three project sites.* The project implementation support will include:

- Development of Contract Documents and contract enforcement,
- Technical design review and quality enhancement,
- Quality assurance and technical audit for civil works,
- Reporting and Monitoring for project implementation progress and challenges faces in the field,
- Technical backstopping to field engineers, including changes in design, technical solution for problem areas and work management,
- Planning and Monitoring of road construction works,
- Enforcement of new technical specifications and contract documents,
- Strengthen contract management and work supervision, and
- Effective implementation of Environmental Management Plans through overall coordination by IDD

4. Safeguard policies that might apply

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The proposed project is likely to cause minimal adverse social and limited environment impacts. The preliminary information indicates that land acquisitions are expected to be largely on the basis of voluntarily donation and, thus, involuntary resettlement is unlikely under the proposed project. The environment impact is expected to be limited as the alignment of the new roads does not fall under any of the protected areas as per the Forest and Nature Conservation Act of Bhutan, 1995.

The draft Social Assessment Framework (SAF) and Sectoral Environmental Framework (SEF), which were formulated in compliance with various RGOB environment policies and the World Bank Safeguard Policies, have been completed and are under final revisions. Draft Final EAs for Jangchucholing-Tashidingka (JT) and Drujeeygang-Balung (DB) roads and EMF are completed. The DOR has obtained “No Objection Certificates” (NOCs) from the competent Dzongkhag and Geogs authorities for the delineation of land for the project. The NEC clearance of EAs and approval of the final alignments will be secured prior to Project Appraisal by the Bank. The comprehensive EMPs for implementation of JT and DB are currently underway as the final road designs are yet to be completed. The comprehensive Environment Management Plan (EMP) will be submitted for review and approval by the Bank. Also the approved EMP will be one of the pre-condition to clear final project designs and bidding documents. With regard to Kothakpa – Khar – Tsebard (KKT) road in Pemagatsle and the additional 6 km of JT road will be subject to EA clearance by NEC prior to implementation. The necessary EA/EMP for these roads will be prepared as per the EMF and cleared by the Bank. In the cases of involuntary resettlements, a project Resettlement Action Plan will be prepared according to the provisions of the Resettlement Plan Framework which was developed within the Social Assessment Framework.

5. Tentative Financing

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