SECTOR ASSESSMENT (SUMMARY): TRANSPORT

1. Sector Performance, Problems, and Opportunities

1. The Kyrgyz Republic is a mountainous, landlocked country bordering the People's Republic of China (PRC) to the east, Kazakhstan to the north, Tajikistan to the south, and Uzbekistan to the west. The country's 2016 gross domestic product per capita (\$1,088.3) was one of the lowest among countries of the former Soviet Union. Regional trade depends heavily on road transport, which dominates the Kyrgyz transport system. About 78% of passenger and 58% of freight traffic is carried by road. The country's transport network comprises approximately 34,000 kilometers (km) of roads, 420 km of railway tracks, 4 international airports, and 7 domestic airports.¹ From 2002 to 2017, vehicle registration increased more than fourfold, from 285,000 to 1,146,780 vehicles; freight traffic by road increased from 875 million ton-km to 1526 million ton-km; and passenger traffic increased from 5081 million passenger-km to 9620 million passenger-km.²

2. The Ministry of Transport and Roads (MOTR) is in charge of transport policy, regulation, planning, and development. The MOTR is responsible for maintenance of 4,163 km of international roads, 5,678 km of national roads, and 8,969 km of provincial roads through its about 60 units responsible for road maintenance, repairs, and construction. Kyrgyz Railways, a state-owned enterprise, is responsible for track maintenance and for train stations, depots, workshops, and freight handling yards. Table 1 provides a summary of the distribution of infrastructure and services.

Spatial Category	Infrastructure and Services	Responsibility/Ownership	
Urban and suburban (local)	Roads	Local government	
	Buses and terminals	Local government and private sector	
	Taxis, trucks, vans, and terminals	Private sector	
Rural (local)	Roads	Local government	
	Buses and terminals	Local government and private sector	
	Taxis, trucks, vans, and terminals	Private sector	
Intercity (national)	Roads	Central government	
	Buses and terminals	Local government and private sector	
	Taxis, trucks, vans, and terminals	Private sector	
	Railways	Central government	
	Airlines and terminals	Private sector and central governmen	
International	Roads	Central government	
	Buses and terminals	Local government and private sector	
	Taxis, trucks, vans, and terminals	Private sector	
	Railways	Central government	
	Airlines and terminals	Private sector and central governmen	

Table 1: Ownership and Responsibility for Road Infrastructure and Services

Sources: Asian Development Bank; and Government of the Kyrgyz Republic, Ministry of Transport and Roads.

3. **Inadequate road infrastructure and maintenance.** Of the international road corridors, about one-third are in poor condition, requiring rehabilitation or reconstruction, while about two-thirds, rehabilitated mainly under development partners' investment programs, are in sustainable condition, requiring only routine or periodic maintenance. The 2017 budget allocation of Som1.8 billion for the MOTR's maintenance work covers about half of the estimated amount needed to

¹ The four international airports are Bishkek Manas, Osh, Issyk-Kul Tamchy, and Karakol. The seven national airports are Batken, Isfana, Jalal-Abad, Kazarman, Naryn, Kerben, and Talas.

² Road subsector-related figures sourced from Government of the Kyrgyz Republic–Ministry of Transport and Roads; and National Statistical Committee of the Kyrgyz Republic.

maintain the roads to an international standard (Table 2). Priority is given to maintain the regional corridors, particularly the Bishkek–Osh road and the Bishkek–Torugart road, recognizing their strategic importance for the country. The government runs separate road corridor management departments for these two roads and allocates sufficient budgets for their maintenance, even considering their maintenance to an international standard (around \$7,000 per km per year for the Bishkek–Osh road and \$5,000 per km per year for the Bishkek–Torugart road).³ The road infrastructure has been routinely affected by the changing climate, with increased temperatures and precipitation, decreasing glaciers, and increased discharge from rivers. This trend is likely to continue as a consequence of climate change, requiring further investments in rehabilitation and maintenance of the road infrastructure.

		(3011	000)			
ltem	2012	2013	2014	2015	2016	2017
Capital investments	181,490	197,737	317,700	1,694,958	2,702,000	2,234,000
Road maintenance	1,684,695	1,846,792	1,730,735	1,792,843	1,618,330	1,804,700
Administration	124,568	113,133	102,408	102,476	114,810	174,500
Total	1,990,753	2,157,662	2,150,843	3,590,277	4,435,640	4,213,200

Table 2: Government's Budgetary Allocation to the Road Sub-Sector, 2007–2017
(Som '000)

Note: Numbers may not sum precisely because of rounding.

Source: Government of the Kyrgyz Republic, Ministry of Transport and Roads.

4. **Poor road safety.** The road accident death rate in the Kyrgyz Republic remains one of the highest in the Central Asian region. The World Health Organization estimates that there were 1220 fatalities in 2013, which corresponds to 22 fatalities per 100,000 people.⁴ Bad road conditions, and weak traffic regulations and enforcement are part of the problem.

5. Lack of integrated transport system. The Kyrgyz railway network is split geographically into north and south sections. For historical reasons, technical standards and track gauges are based on the Russian railway system. These are compatible with Kazakhstan, Russian Federation, and Uzbekistan, but incompatible with the neighboring People's Republic of China's (PRC's) railway network. Effective transshipment facilities are therefore needed to facilitate international traffic through the Kyrgyz Republic. International and regional airports are limited to major population centers within the country. These hub airports provide connectivity to smaller domestic services serving secondary towns and remote areas of the country. The Kyrgyz airline (Air Manas) is not permitted to fly within the European Union because of safety concerns, so international services are provided by international carriers.

2. Government's Sector Strategy

6. In 2018, the government approved its development program—Unity, Trust, Creation covering 2018–2022, which prioritizes construction and expansion of the network of highways and international transport corridors to improve connectivity.⁵ The development program prioritizes the construction of the North–South Alternate Corridor. Development of transport and road infrastructure under the Central Asian Regional Economic Cooperation (CAREC) Program is a priority area identified by the 2018–2022 development program. To ensure regional connectivity, access to the regional markets for goods and services, and development of transit capacity and transport independence, the government has been implementing rehabilitation of the following six corridors: (i) Osh–Sarytash–Ikeshtam, (ii) Bishkek–Naryn–Torugart,

³ Data from the MOTR's 2017 road maintenance budget.

⁴ Source: World Health Organization website <u>http://www.who.int/</u> accessed on 6 September 2018

⁵ Government of the Kyrgyz Republic. 2018. *Development Program of the Kyrgyz Republic, 2018–2022: Unity, Trust, Creation.* Bishkek.

(iii) Osh–Batken–Isfana, (iv) Taraz–Talas–Suusamyr, (v) North–South Alternate Road, and (vi) Issyk-Kul Ring Road.

7. The government also recognizes that the Kyrgyz rail network does not meet the needs of regional traffic as the two parts of the system—north and south—are not connected with each other, and the wagon fleet and the locomotives are more than 35 years old and are below international standards. There is also an urgent need to modernize airport facilities and air navigation equipment to meet increasing traffic demand and attract international tourists. Discussion with the PRC on the construction of the major rail corridor: PRC–Kyrgyz Republic–Uzbekistan railway is ongoing. However, the economic viability of the project needs to be assessed. The government is interested in introducing public–private partnerships for infrastructure projects in order to lessen the burden of financing, maintaining, and rehabilitating roads.

8. The government prepared a transport master plan, covering the road, rail, and aviation subsectors, for the systematic and planned development of the transportation network.⁶ The master plan has become the guiding document for the short-, medium-, and long-term priority investment program until 2025, providing a physical layout for rehabilitation and maintenance. Furthermore, the government has adopted a railway development program, 2014–2020;⁷ an aviation development program, 2015–2020;⁸ and a road development strategy up to 2025⁹ built on conclusions of the master plan.

3. Asian Development Bank Sector Experience

9. Since 1996, the Asian Development Bank (ADB) has financed 11 road rehabilitation projects and 5 technical assistance projects. Loans and grants totaling \$655 million have been spent on road projects, while technical assistance projects totaling \$3.3 million have focused on capacity development and institutional support. ADB assistance has rehabilitated and improved an estimated 985 km of roads in key regional corridors, an example of which is the Bishkek–Osh road. When ADB rehabilitated 483 km of the Bishkek–Osh road's 670 km (ADB financed \$246 million and Japan Bank for International Cooperation cofinanced \$69 million), 3,000 roadside households benefited from increased road-related trade activities, travel time was reduced from 20 hours to 9 hours, and the number of vehicles using the road increased from 800 per day before rehabilitation to 8,500 per day.¹⁰

10. ADB is the lead multilateral donor organization for the sector in the country. Other development partners in the sector include the Arab Coordination Group,¹¹ the European Bank for Reconstruction and Development, the European Commission, the Eurasian Development Bank, the Islamic Development Bank, the Japan International Cooperation Agency, the Government of the PRC including the Export-Import Bank of China, and the World Bank. Considering the growing transport demand, ADB's sector experience, and the history of

⁶ The transport master plan was supported by ADB Grant 0123-KGZ: CAREC Transport Corridor 1 (Bishkek-Torugart Road) Project 1.

⁷ Government of the Kyrgyz Republic. 2014. *Main Directions of Rail Transport Development, 2014–2020.* Bishkek.

⁸ Government of Kyrgyz Republic. 2015. Civil Aviation Development Program, 2015–2020. Bishkek.

⁹ Government of Kyrgyz Republic. 2016. Road Sector Development Strategy up to 2025. Bishkek. Preparation of this strategy was supported by ADB. 2011. Report and Recommendation of the President to the Board of Directors: Proposed Loan to the Kyrgyz Republic for the CAREC Corridor 1 (Bishkek–Torugart Road) Project 3. Manila.

¹⁰ ADB-IED. 2010. Project Performance Evaluation Report: Road Rehabilitation Project, Second Road Rehabilitation Project, and Third Road Rehabilitation Project (Kyrgyz Republic) (Loans 1444, 1630 and 1853-KGZ). Manila.

¹¹ The Arab Coordination Group comprises the Saudi Fund for Development, Kuwait Fund for Arab Economic Development, Organization of the Petroleum Exporting Countries, and Abu Dhabi Fund for Development.

cooperation and shared priorities of ADB and the government, ADB will continue to assist the government in the following areas (paras. 11–15).

11. **Connectivity.** ADB's assistance will continue to focus on strengthening the road network. Roads are the most cost-effective and dependable mode of transport, given the country's large geographic area, low population density, extreme climate, and mountainous topography. Upgrading the rail system to serve the whole country would require significant resources and longterm planning and commitment from the government. At this time, these investments may not be economically and financially feasible.

12. In line with the strategic objectives of expanded trade and improved competitiveness of the new strategic framework of CAREC 2030, ADB will continue to promote regional connectivity by supporting the completion of CAREC transport corridors. ¹² Also, ADB will assist the government in improving connectivity between domestic market centers and regional corridors to further enhance the economic value of the regional corridors. ADB will assist CAREC countries in facilitating the cross-border movement of goods and people along the corridors. The ADB-assisted CAREC Trade Facilitation Program covers customs modernization, a joint customs control initiative, and other key measures for CAREC countries, including the Kyrgyz Republic (footnote 12). ADB will support the integration of climate-proofing measures in the construction, operation, and maintenance of road projects.

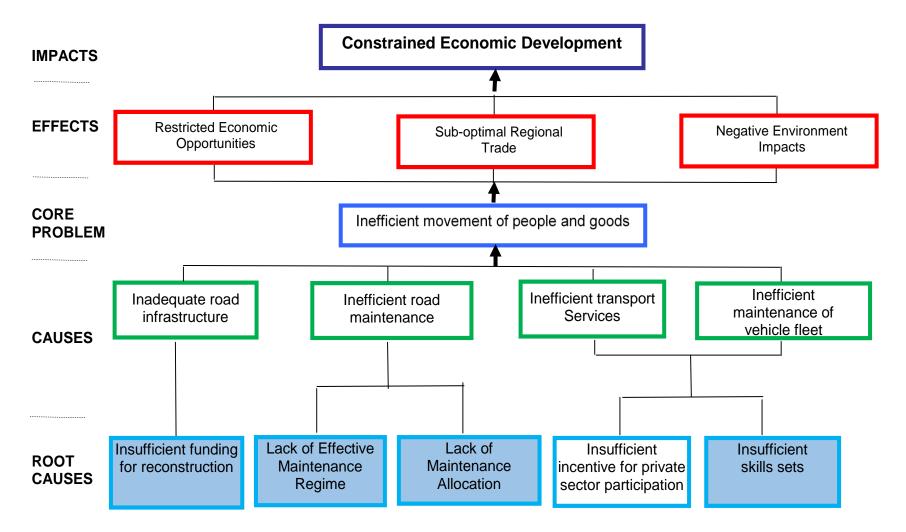
13. **Maintenance.** Sustainability of road assets is a critically important issue requiring immediate attention. Therefore, ADB, together with other development partners, will continue assisting the government in implementing road maintenance system institutional reform, developing its long-term road asset management system to ensure sufficient funds are allocated for maintaining the existing network. To improve the efficiency and quality of road maintenance and to increase private sector commitment and accountability to road maintenance, ADB is assisting the MOTR in piloting performance-based road maintenance contracts. ADB will continue coordination with other donor partners with experience in road asset management in the Kyrgyz Republic, such as the European Bank for Reconstruction and Development, Japan International Cooperation Agency, and World Bank, to support road sector reform by strengthening quality of and resource allocation in road maintenance.

14. **Road safety.** Considering the high accident and mortality rates in the Kyrgyz Republic and as articulated in the CAREC Transport and Trade Facilitation Strategy 2020, road safety is an essential complement to strengthening the road network. ADB will continue its active involvement by assisting the government to improve road safety management, including by developing (i) a national road infrastructure safety strategy and road safety checklist, and related guidelines; and (ii) a road safety action plan for all road sections, including road safety audits and capacity building, public awareness programs, and addressing the needs of women and children, e.g., for safe crossings and well-lit transit stops.

15. **Railways.** Because of its central location surrounded by countries of the Commonwealth of Independent States, South Asia, and East Asia, the Kyrgyz Republic has the potential to capitalize on its assets economically and geopolitically. Being an active CAREC member, the Kyrgyz Republic can leverage its location by initiating expansion and upgrading its railway network. Where feasible, ADB could consider supporting railway projects under the CAREC umbrella.

¹² ADB. 2016. CAREC 2030: Connecting the Region for Shared and Sustainable Development. Manila.

Problem Tree for Transport



Note: Blue shaded boxes indicate the areas of intervention covered by the proposed project.