

RISK ASSESSMENT AND RISK MANAGEMENT PLAN

Risk Description	Risk Assessment	Mitigation Measures or Risk Management Plan
General		
Economic activities are adversely affected by natural disasters and climate change impacts.	High	The project includes environmental improvements focused on flood control, erosion protection, and solid waste management. Climate change impacts have also been identified as a key issue; they have been incorporated in the town urban development strategies and project design. SPCR funding will reduce this risk to low–medium.
In-migration in Kampong Chhnang and Pursat may increase pressure on the environment and urban infrastructure.	Medium	The project improves urban environmental conditions in the towns and will support PDPWT to provide sustainable urban services—supporting in-migration in Kampong Chhnang and Pursat and reducing the risk to low.
Project investments are not in line with regional and individual town strategic and infrastructure planning in Kampong Chhnang and Pursat.	Medium	A Tonle Sap Urban Areas Development Framework has been prepared and endorsed by provincial governments and will be approved during project implementation. Government urban development strategies, 2014–2030 for Kampong Chhnang and Pursat have been prepared in close consultation with a range of stakeholders. These strategies were approved by provincial authorities on 31 July 2014 (MPWT Letter No. 009 PMU/MPWT/IEUMTB/14/30 July 2014 for Kampong Chhnang and No. 008 PMU/MPWT/IEUMTB/14/30 July 2014 for Pursat). The project will help incorporate the strategies into future provincial and municipal 3-year and 5-year rolling plans—reducing the risk to low.
Implementation Arrangements		
Use of a special account and utility unit for delivering decentralized urban services may not be appropriate.	Medium	The project will support the establishment of a special account and utility unit based on the Siem Reap wastewater management experience. The government is committed to decentralization and deconcentration, and has agreed to pilot test this arrangement in the project. The units will be formed from the PIUs that will have received capacity development support—reducing the risk to low–medium.
The government will not allocate sufficient and qualified human resources to support the project.	Medium	Project implementation structures will be established by loan negotiations. A long-term vision for institutional strengthening, a capacity development program, and project management and implementation consulting services will support government project staff—reducing the risk to low.
Lack of availability of qualified project staff in Kampong Chhnang and Pursat.	Medium	The project includes consulting services that will provide on-the-job training to PMU and PIU staff. The provision of contractual staff (or secondments from other ministries) has also been discussed with MEF—reducing the risk to low.
Failure to carry out regular reporting and monitoring of the project.	Medium	The MPWT has experience with externally funded projects. The PMU has experience administering ADB-financed projects—reducing the risk to low–medium.
Poor information systems.	Medium	Computerized software with access protection and secure audit trace will be used—reducing the risk to low–medium.
Project Costs		
Project cost estimates may not be sufficient owing to unforeseen circumstances (e.g., extra construction, inflation).	Medium	The project has used conservative cost estimates in 2015 prices. It will follow ADB procurement guidelines for civil works contracts, and includes price and physical contingencies for the ADB loan and the SPCR loan and grant to cover such unforeseen events—reducing the risk to low.
Limited project resources and slow bidding processes	Medium	Project costs have been calculated using 2015 estimates. ADB standard bidding procedures will be followed—reducing the risk to low.

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Design, Operation, and Maintenance		
Urban residents are unaware of the links between climate change, health, and environmental sanitation.	Medium	The project includes measures to increase community awareness and ownership for environmental improvements. It also includes support for climate change and health awareness and action—reducing the risk to low.
The technical design and specifications exceed the skills set of subnational staff for O&M.	Medium	The project adopts engineering designs with proven records of reliable performance. Technical options were considered during project preparation, and site selections were done with the community, municipalities, and PDPWT. The designs were also improved to take into account the local capacity for O&M. The procurement of equipment includes technical support for installation, testing, and commissioning. Equipment and civil works will comply with design requirements and quality standards. For the drainage and solid waste management (i.e., landfill management), low technology options and manual labor are recommended for O&M—reducing the risk to low.
High environment impacts of infrastructure and civil works.	Medium	Draft initial environmental examinations (including environmental management plans) and environmental assessments and review framework have been prepared. They were approved by MOE in principle on 15 August 2014—reducing the risk to low–medium.
High land acquisition and resettlement impacts of project infrastructure could delay project implementation.	Medium	Resettlement plans and a resettlement framework provide clear entitlements. The designs have been reviewed and revised to minimize the impact of land acquisition and resettlement. Agreement has been reached with the Interministerial Resettlement Committee (IRC) that impacts shall remain Category B (even at implementation). IRC approved the draft resettlement plans on 21 August 2014. An external resettlement monitor, recruited by the government, will assist in monitoring resettlement activities (although not required for a category B project)—reducing the risk to low–medium.
The river embankment protection in Kampong Chhnang will reduce access to the river for fishing, gardening, and water collection.	Medium	The project designs envisage continued access to the river. The project's stakeholder and communication strategy highlights the need for continued consultation with villagers during detailed design. Key groups include water user groups along the agricultural part of the embankment, floating communities in Kandal village, and Cham boat communities in Chong Kaoh. These communities are also target communities of output 3. This reduces the risk to low.
Arrangements for the O&M of subproject assets are not implemented effectively.	Medium	The project will support a pilot demonstration on the establishment of an urban services unit in Kampong Chhnang and Pursat. Milestones on the establishment and gradual transfer of urban services have been incorporated into the design and monitoring framework. The experience will follow the wastewater treatment in Siem Reap. A set of individual institutional specialists will be recruited early in 2015 to prepare the necessary legislations to support establishment by project midterm—reducing the risk to low.
Financial Management Arrangements		
Municipalities are not prepared to collect revenues for O&M of urban infrastructure.	High	The MPWT will pursue improved collection of fees and charges for urban environment infrastructure to recover the cost of O&M expenditures. The MPWT has applied a similar approach in Siem Reap under the Greater Mekong Subregion Mekong Tourism Development Project where a special municipal office has been established to collect user fees of the wastewater treatment plant and collection fees from private and institutional users. A similar approach will be used for the project towns. A special operating agency and account will be established and linked to contract awards for embankment protection in Kampong Chhnang and for drainage in Pursat. These units will be encouraged to introduce business plans to recover O&M costs for the services provided. An environmental sanitation fee will be introduced—

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The PIUs in Kampong Chhnang and Pursat are new entities and may have difficulty in managing project sub-accounts and adhering to accounting policies and procedures.	Medium	The PIUs will draw management staff from PDPWTs and municipalities. A PMU in the MPWT will support the PIUs in project implementation. The PMU will use a project financial management system developed under previous ADB projects, and will be responsible for all procurement. It will support the PIUs, with assistance from the project management and implementation support consultants. A provincial coordination committee will guide the project in each town. Each PIU sub-account will have a ceiling of \$5,000. To ensure strict financial controls, each PIU will be required to liquidate every month. A late submission of liquidation (more than 10 days from the end of the month) will be grounds for suspension of the sub-account—reducing the risk to low–medium.
Fund mismanagement	Medium	The implementation arrangements are outlined in the project administration manual. All procurement will be done from within the PMU; a representative from each PIU will be invited to participate on the procurement committee. An imprest account will be established in the PMU. A sub-account will be established in each PIU, with a ceiling of \$5,000 and requirement for monthly liquidations. The proposed fund allocation also helps minimize fund mismanagement—reducing the risk to low.
Inadequate internal audit	Medium	Each government ministry has a Department of Inspectorate, whose role is to carry out the functions of an internal auditor within the ministry, and ensure that government rules and regulations are observed at all times. The MPWT has extensive experience in undertaking audits for externally financed projects. The <i>Standard Operating Procedures for all Externally Financed Projects/Programs in Cambodia</i> (May 2012) outline the requirements for internal audit—reducing the risk to low–medium.
Inadequate external audit	Medium	The MEF will recruit an independent auditor to carry out external audits of all externally financed projects, including ADB-supported projects. The <i>Standard Operating Procedures for all Externally Financed Projects/Programs in Cambodia</i> (May 2012) outline the requirements for external audit—reducing the risk to low–medium.
Overall	Medium	

ADB = Asian Development Bank; IRC = Inter-Ministerial Resettlement Committee; MEF = Ministry of Economy and Finance; MLMUPC = Ministry of Land Management, Urban Planning and Construction; MOE = Ministry of Environment; MPWT = Ministry of Public Works and Transport; O&M = operation and maintenance; PDPWT = provincial department of public works and transport; PIU = project implementation unit; PMU = project management unit; SPCR = Strategic Program for Climate Resilience.

Source: Asian Development Bank.