Viet Nam: Greater Mekong Subregion: Kunming–Haiphong Transport Corridor—Noi Bai–Lao Cai Highway Project
ABBREVIATIONS

ADB – Asian Development Bank
COVID-19 – coronavirus disease
DMF – design and monitoring framework
EIA – environmental impact assessment
EIRR – economic internal rate of return
EMR – environmental monitoring report
FIRR – financial internal rate of return
GMS – Greater Mekong Subregion
IRP – income restoration program
km – kilometer
LAR – land acquisition and resettlement
MOT – Ministry of Transport
NEPMU – Northern Expressway Project Management Unit
O&M – operation and maintenance
PCR – project completion report
PRC – People’s Republic of China
PSC – project supervision consultant
REMDP – resettlement and ethnic minority development plan
RRP – report and recommendation of the President
TA – technical assistance
VEC – Vietnam Expressway Corporation

NOTE

In this report, “$” refers to United States dollars and “D” refers to Vietnamese dong.

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I. PROJECT DESCRIPTION

A. Rationale

1. The Noi Bai–Lao Cai highway was an integral section of the eastern link of the Greater Mekong Subregion (GMS) Northern Economic Corridor, connecting Kunming in Yunnan province...
of the People’s Republic of China (PRC) with Ha Noi, and Hai Phong and Cai Lan ports in Viet Nam. In Yunnan, a 400-kilometer (km) expressway with four to six lanes from Kunming to the border with Viet Nam was to be completed in 2008. However, most of the existing national roads between Ha Noi and Lao Cai, on the border with the PRC, were narrow, with many low-capacity bridges and sections, as well as substantial ribbon development on most sections. These factors severely limited the road capacity and reduced the possibility of improving it to meet the projected substantial growth in traffic demand in the corridor.

2. The section of the highway from Noi Bai to Ha Noi and Hai Phong was improved with the assistance from other development agencies. The Noi Bai–Lao Cai section was the only section that needed upgrading to complete the Kunming–Hai Phong Highway. The highway would well complement rail and inland waterway, contributing to satisfying the increasing demand for passenger traffic and high-value general cargo traffic. This required a flexible and responsive mode to meet the needs of a market economy. In the influence area of Noi Bai–Lao Cai section, the local people, especially those living below the poverty line, would benefit from decreased travel cost, improved access to social services, and increased employment opportunities.

3. In response to government request, the Asian Development Bank (ADB) approved the GMS: Kunming–Hai Phong Transport Corridor—Noi Bai–Lao Cai Highway Project. It aimed to promote sustainable economic growth and poverty reduction in the project area and along the Kunming–Hai Phong transport corridor, augment the connection with Yunnan province, strengthen international competitiveness, and enhance people’s mobility living along the highway. The government was the borrower, relending the loan proceeds to the Vietnam Expressway Corporation (VEC) on the general terms of the loan with a 0.2% administration fee.

B. Expected Impact, Outcome, and Outputs

4. The project's design and monitoring framework (DMF) at appraisal and completion indicated that the project's expected impact was sustainable economic growth and strengthened connectivity with the PRC in the project area and along the Kunming–Hai Phong Transport Corridor. The intended outcome was international and local traffic using an efficient, safe, and reliable express route from Noi Bai to Lao Cai. The project had three outputs: (i) the construction and operation of 244 km of Noi Bai–Lao Cai Highway with 10 grade-separated interchanges and five service areas; (ii) strengthening of the institutional and financial management capacity of VEC; and (iii) program on HIV/AIDS, human and illicit drugs trafficking to minimize local population exposure to these issues.

C. Provision of Inputs

5. ADB approved the project in December 2007. The loan agreement was signed in September 2008 and became effective in March 2009. The project was completed in November 2017, seventeen months later than planned. Its loan closing date was extended by 5 years to December 2017. The project implementation was mainly delayed due to late loan effectiveness, rebidding consulting services, updating resettlement and ethnic minority development plan (REMDP), slow implementation of land acquisition and resettlement (LAR) activities, delays in removal of infrastructure for public utilities, changes in the detailed design and additional works,


longer-than-expected rainy season, and poor performance of contractors. After loan closing, processing withdrawal applications and liquidation of advances took until October 2019.

6. At appraisal in 2007, the total project cost was estimated at $1,216 million, with an ADB financing of $1,096 million (90.1%) and a government counterpart financing of $120 million (9.9%). ADB financing comprised a loan of $896 million from the ordinary capital sources and a loan equivalent to $200 million in special drawing rights from ADB’s Special Funds resources. In 2014, it was noted that an additional financing of $182 million was required for cost overruns (para. 15). Of the total $182 million needed, ADB provided $147 million, and the government the remainder. With the additional financing, the total project cost was updated to $1,398 million, with 88.9% from ADB and the balance from the government. At completion, the actual total project cost was 13.5% lower than the revised estimate. Of the final cost, 88.7% came from the ADB loan and the balance was from the government. The lower actual project cost was largely attributed to the lower financial charges as a result of lower interest rates and partial loan cancellations.

7. A consulting firm was engaged using quality- and cost-based selection procedures. The recruitment process started in early 2008. Due to uncertainties associated with local taxes, a rebidding was required, delaying the selection process. The project supervision consultant (PSC) firm was mobilized in November 2009 and rendered consulting services related to supervision of civil works for highway construction and assistance to the VEC in environmental management, LAR and income restoration, and social development activities. It also assisted VEC in equipment procurement, training for highway operation and maintenance (O&M), and development of staff skills in project implementation management. VEC recruited an external monitoring agency to carry out monitoring and assist with the REMDP implementation. The project procured eight civil works contracts and three equipment contracts, all through international competitive bidding procedures. The procurement and contract-awarding were behind schedule to various extent. The project was classified as category A for environment, involuntary resettlement, and indigenous peoples. It was categorized as "some gender elements."

D. Implementation Arrangements

8. As planned, VEC was the executing agency responsible for project implementation and correspondence with the line ministries, ADB, and provincial authorities. Its environmental unit was strengthened with increased staff. A social and resettlement unit was established to oversee social and resettlement matters in coordination with the Ministry of Transport (MOT) and local authorities. For day-to-day project implementation, a project management team for the project highway was established by VEC, which later was reorganized as the Northern Expressway Project Management Unit (NEPMU). The NEPMU had its head office in Ha Noi and four field offices. The staff members from VEC’s environmental unit and social and resettlement unit were assigned to the field office. With adequate qualified staff and support from the consultants, NEPMU was responsible for undertaking project works across all aspects, including project preparation and design, procurement and contract management, civil works supervision and quality control, financial management and audits, environmental and social safeguard measures, loan covenant compliance, coordination with local governments, among other things.

9. The executing agency complied with 39 of the 46 covenants in the loan and project agreements. Among the balance of seven covenants, one was not complied with, four were partially complied with, and two were not yet due by project completion report (PCR) preparation. The one not complied with referred to VEC’s high debt level as shown in some audited project financial statements. There were four partially complied with covenants. First, the environmental monitoring during the operation phase was not conducted in accordance with the environmental
monitoring plan. Second, LAR activities were commenced in some areas before the updated REMDPs were reviewed and approved by ADB. Third, although the project performance monitoring system was established, and a baseline survey was conducted, there was no follow-up survey and evaluation conducted afterwards. Fourth, baseline data were collected but subsequent surveys were not administered. The covenants not due were the debt-equity ratio for fiscal year 2020, for which the details of the balance sheet for the whole VEC were not available at the time of PCR preparation, and the income restoration assistance to be provided to 26 affected households after the coronavirus disease (COVID-19) pandemic is over.

10. A $6 million technical assistance (TA) loan approved in December 2005 from the Asian Development Fund supported the project. It was designed to assist the government in preparing the project with focus on detailed engineering design, economic and financial studies, social and environmental studies, and procurement assistance for civil works and construction supervision consulting services for the project highway. The project was also supported by a capacity development TA on fighting HIV/AIDS. A subproject of this TA was implemented to reduce the spread of HIV along the project highway during and after the construction stage, and to mitigate the risks of drug use, and trafficking of drugs and individuals.

II. EVALUATION OF PERFORMANCE AND RATINGS

A. Relevance of Design and Formulation

11. The PCR rated the project relevant. At appraisal and during its implementation, the project was aligned with the policies, strategies, and development priorities of the Viet Nam government. The Socioeconomic Development Plan (SEDP) for 2006–2010 highlighted the importance of transport sector in promoting socioeconomic growth, poverty reduction, safety enhancement, environmental protection, and human resource development. The SEDP for 2011–2015 emphasized the need for more effective management of the transport sector. The master plan for the north-south expressway-eastern side, approved by the Prime Minister of Viet Nam in 2010, set out to construct 16 expressways along the eastern side of Viet Nam over a 14-year period with a total investment cost of $17.9 billion. It addressed the alignment, technical standards, investment cost, and construction period, and provided details of required land appropriation. The project highway was an integral part of the plan.

12. At appraisal, the project was aligned with ADB's strategies and policies. As stated in ADB's Country Strategy and Program for Viet Nam, 2007–2010, ADB's strategy for transport sector identified three thrusts: (i) supporting the development of provincial and district roads to address the social equity aspects of Viet Nam's transport needs; (ii) supporting investment projects to address critical transport needs constraining economic growth in main development centers; and (iii) bringing subregional dimensions to the development of the transport network in terms of connectivity. ADB's Strategy 2020 identified infrastructure as a core area of operations and
emphasized continued investment for improved transport connectivity within and among developing member countries.\textsuperscript{9} ADB’s Sustainable Transport Initiative Operational Plan of 2010 noted continuing needs for road construction and improvement and also identified cross-border transport and logistics as opportunities for introducing new and enhanced transport operations.\textsuperscript{10}

13. During its implementation, the project continued to be relevant to ADB’s strategies. ADB’s Country Partnership Strategy for Viet Nam, 2012–2015, defined the improvement of transport sector efficiency as a strategic target to maintain sufficient transport infrastructure and improve road safety.\textsuperscript{11} Operationally, construction and improvement of expressways and national and provincial roads formed part of ADB’s interventions to the road transport subsector. In ADB’s Country Partnership Strategy for Viet Nam, 2016–2020, supporting the upgrading of crucial urban transport infrastructure including major city ring roads, and improving transport links between and within secondary towns were among the operational priorities under the strategic pillar of increasing the inclusiveness of infrastructure and service delivery.\textsuperscript{12} The project was also aligned with ADB’s Strategy 2030, which identified the development of rural roads for improved rural–urban connectivity as part of its operational priorities for promoting rural development.\textsuperscript{13}

14. The project experienced serious cost overruns in civil works caused primarily by price escalation of materials and labor costs, changes in detailed design, and additional project scope. The price escalation was an external development unforeseeable at appraisal. The detailed design, despite its impact on the costs, could not be considered a design and/or readiness weakness of the project per se since it was prepared by a separate TA loan (para. 10) and was completed well after the project appraisal in 2007. The scope changes occurred due to three reasons.\textsuperscript{14} First, the project highway was originally designed with four lanes for the Noi Bai–Yen Bai section and two lanes for the Yen Bai–Lao Cai section. To ensure safety during the O&M stage, ADB agreed to finance additional works to widen 11 subsections of the Yen Bai–Lao Cai section to four lanes with a total length of 25 km. Second, additional works were for road safety, such as frontage roads in the enlarged sections, slope protection in the km 80–110 section, and traffic safety facilities along the highway, i.e., traffic signs, sign boards, marker posts, reflective studs, variable message signs, fences, and guardrails. Third, at the request of VEC, some laboratory equipment were added to enhance the quality control of the highway construction. Due to lack of details, it is unclear whether the first and second scope changes were to address design weakness that should have been clearly foreseen and avoided or were to optimize a design that could be considered as reasonably appropriate. These changes strengthened the project’s design and construction. These, along with the third scope change, helped maintain the relevance of the project.

15. The cost overruns necessitated additional financing in 2014, which was timely and appropriate. Alternatively, the project scope would have been reduced by terminating the civil works contracts in Yen Bai and Lao Cai provinces, and the remaining loan funds would have been used to complete the civil works contracts in Ha Noi, Vinh Phuc, and Phu Tho provinces. This option would have resulted in a deadweight loss. An incomplete highway would not generate any

\textsuperscript{10} ADB. 2010. \textit{Sustainable Transport Initiative Operational Plan}. Manila.
economic and social benefits for road users and the affected people in Yen Bai and Lao Cai provinces, who already moved to the relocation sites. Completion of the highway sections could only be achieved at a significantly higher cost, given the need to re-tender the civil works contracts. As such, it was judicious to arrange additional financing. At the time of appraisal for additional financing, some targets in the original DMF were finetuned to reflect the project implementation progress and the general context of social and economic development in project influence area. Both original and modified DMF had logical and sound links of outcome and outputs, reflecting the appropriateness and continuum of the results chain leading up to the high-level development impact. Based on the discussion, this validation assesses the project relevant.

B. Effectiveness in Achieving Project Outcome and Outputs

16. The PCR rated the project effective. This validation notes that the project's intended outcome was largely achieved by loan closing as seven out of the eight outcome targets were achieved. Travel time from Noi Bai to Lao Cai decreased from 7–10 hours to 3–5 hours, improving over 50%. Traffic volume increased to 14,921 (target 18,000) for Noi Bai–Viet Tri section; 9,105 (target 6,500) for Viet Tri–Yen Bai section; and 4,977 (target 4,700) for Yen Bai–Lao Cai section. Most of the traffic including heavy trucks on national highway No. 2 and No. 70 were diverted to the Noi Bai–Lao Cai highway. The fatality rate declined from 16.3 fatalities per billion vehicle-km in 2015 to 0.8 in 2018. More than 500 large buses a day were operated on the project highway in 2018, most of which were for public transportation. Local bus service was available in all project districts. From 2011 to 2017, the number of industrial parks increased by 14% in Noi Bai, 130% in Vinh Phuc, 279% in Phu Tho, 23% in Yen Bai, and 27% in Lao Cai. In 2018, the total length of expressways in Viet Nam increased to 552 km, from its 2009 baseline of 349 km. The only unachieved outcome target referred to HIV/AIDS cases in the project area. Against the target of zero increase, the infected population increased in all project provinces.

17. Of the eight output targets, six were achieved and two were partially achieved. At completion, with the construction and operation of the project highway, travel distance from Noi Bai to Lao Cai decreased from 298.0 km to 245.2 km (target 255 km). The unit vehicle operation costs dropped by 30.8% (target: 20%), as compared to the baseline level. An environment management plan (EMP) was implemented during construction to mitigate the adverse environment impacts. An income restoration program (IRP) was implemented as part of the REMDP. At completion, VEC delegated the highway O&M to its two joint-venture companies, i.e., VEC-O&M and VEC-Services, which were equipped with vehicles and facilities for emergency rescue, regular patrolling, and routine maintenance. The project implementation strengthened VEC’s capacity in project management, corporate finance management, planning and implementation of highway O&M, and safeguard planning and implementation. According to VEC’s statistics, the toll revenue increased from Vietnamese dong (D) 229,652 million in 2014 to D1,270,794 million in 2018, which was generally adequate to cover debt services. The two partially achieved targets were related to road safety and HIV/AIDS. Despite the implementation of activities targeting road safety awareness and mitigation of HIV/AIDS risks, the number of traffic accidents and the cases of HIV/AIDS remained high in the project area.

18. The project was correctly classified for safeguards categories. A full environmental impact assessment (EIA) was prepared, but only a summary EIA was published on ADB’s website. The detailed project design avoided all the identified sensitive areas. VEC was responsible for ensuring that the contractors prepared site-specific EMPs. A total of 23 environmental monitoring reports (EMRs) were prepared. The EMRs were detailed and supplemented with evidence from all eight civil works construction sites. There were no EMRs prepared and submitted during road operations.
19. The construction of the highway and its auxiliary facilities had a wide range of resettlement impacts, including permanent land acquisition, temporary land occupation, physical displacement or house demolition, relocation, and resettlement. Given the expected impacts on ethnic minorities, a combined REMDP was prepared in August 2007. Following detailed engineering designs, the REMDP was updated for each of the affected districts, based on the results of detailed measurement surveys. This produced 17 district-specific REMDPs. To cover additional LAR needed for frontage roads and land use conversion, 11 REDMP addendums were prepared in 2016 and 9 in 2017. Due to errors in the detailed measurement surveys and adjustments of the engineering design of highway components and road alignments during implementation, the total number of affected households increased significantly, from the original 5,458 at appraisal to the final 25,516 at completion. An approach balancing the Viet Nam government and ADB compensation policies was implemented. All compensation payments were made and signed off and land was handed over to contractors in 2012. An IRP was established for severely affected households and vulnerable affected households and implemented between 2012 and 2014. Households affected by additional LAR in 2016 and 2017 and eligible for IRP would receive income restoration assistance after the COVID-19 pandemic is over. A grievance redress mechanism was established. At project completion, no outstanding grievances existed.

20. A full indigenous peoples development plan was not required for this project. Consultations with community, traditional leaders, ethnic minorities, and affected persons were conducted during project design and implementation. Ethnic minority considerations were fully considered in the district-specific REMDPs and addendums. The socioeconomic and inventory-of-losses surveys indicated that impacts on the ethnic minority groups and the main ethnic group would be the same. An ethnic minority development plan was incorporated in the resettlement plan to ensure that ethnic minority groups would not be marginalized during resettlement activities. At project completion, there were no reported grievances from the ethnic minority community. Based on these, as the project's planned outputs and intended outcome were largely achieved, this validation assesses the project effective.

C. Efficiency of Resource Use

21. The PCR rated the project efficient, based on the reevaluated economic internal rate of return (EIRR). The PCR’s reevaluation of the EIRR was consistent with the approach taken at appraisal. The economic capital investment cost was updated based on the actual financial costs for the civil works, reflecting the actual project activities and implementation delays. The O&M cost per km was estimated based on actual data for 2014–2018 from VEC, and an assumed annual rate increase of 3%, applied from 2019 onwards, to factor in traffic growth and highway condition deterioration over time. Periodic maintenance for pavement overlay and major rehabilitation was assumed to take place every 5 years at 5% of the capital costs. The actual project cost at completion was marginally below the originally appraised cost due to partial cancellations of the additional loans. The economic benefits included savings in vehicle operating costs and passenger travel time costs as a result of better road condition, shorter distance, and less travel time. The updated traffic projection on the project highway at the appraisal of additional financing in 2014 was further updated based on the actual traffic on the project highway from 2016 to 2018, potential increase in traffic demand in the project areas and the international transport corridor, and the capacity of the project highway.\(^{15}\) Generated traffic was assumed to

\(^{15}\) For cars and small buses, the annual growth rate projection was 15% for 2019–2020, 10% for 2021–2025, 6% for 2026–2030, and 3% for 2030 and after. For large buses, the annual growth rate was projected to be 12% for 2019–2020, 10% for 2021–2025, 6% for 2026–2030, and 3% for 2030 and after. For all categories of trucks, the annual
be 20% of the total traffic and its benefits were estimated as half of those accruing from normal traffic.

22. The recalculated EIRR was 15.9%, exceeding the benchmark of 12% and suggesting economic viability. Compared with the EIRR of 18.2% at appraisal, the recalculated EIRR was lower due primarily to increased cost of civil works and an extended implementation period. Sensitivity analysis under adverse scenarios suggested that the project would highly likely remain economically viable. A 20% increase in O&M costs combined with a 20% decrease in benefits would result in an EIRR of 13.5%. On the whole, as the reevaluated EIRR exceeded the benchmark, this validation assesses the project efficient.

D. Preliminary Assessment of Sustainability

23. The PCR rated the project likely sustainable. Its reevaluation of the project's financial internal rate of return (FIRR) largely followed the approach taken at appraisal and was in line with the general principles and sector-specific considerations outlined in ADB's guidance note. The PCR updated the financial analysis to reflect the actual project capital costs and implementation delay at loan closing. The O&M cost per kilometer was also updated, based on actual costs from 2014 to 2018 and an assumption of 3% increase per year to account for traffic increases and highway condition deterioration. For toll revenues, actual revenues were used for 2014–2018 and the estimation for 2019 onwards was done assuming an annual revenue growth rate of 10% for 2019–2020, 8% for 2021–2025, 6% for 2026–2030, and 3% for 2030–2035.

24. The recalculated FIRR was 4.30%, exceeding the weighted average cost of capital (WACC) of 2.75% recalculated at loan closing, thereby suggesting the project's financial viability. The recalculated FIRR was lower than the original FIRR at appraisal due to increase in cost of civil works, an extended implementation period, and lower-than-expected actual toll levels. Sensitivity analysis under the adverse scenario of a 10.0% increase in O&M cost and a 10.0% decrease in revenue showed that the FIRR was 3.6%, still above the WACC. Under a more adverse, and less likely scenario of a 20% increase in O&M cost and a 20% decrease in revenue, the FIRR would decrease to 2.7%, only marginally below the WACC.

25. The highway project was opened to traffic in September 2014. VEC delegated the highway O&M to its two joint-venture companies: VEC-O&M would be responsible for 149 km of the project highway and VEC-Services for the remaining 95 km. In the first quarter of 2020, a total of 465 staff worked on the project highway, either at the headquarters or in the 14 toll plazas. All plazas were equipped with vehicles and facilities for regular patrolling, routine maintenance, and emergency rescue. An electronic toll collection and traffic information monitoring system was installed and operated from VEC-O&M's office. Overloading of trucks is controlled by weighing equipment at all entries.

26. The MOT established VEC in 2004 to be responsible for planning, construction, and O&M of the expressway network in the country. VEC was to be funded by toll revenues and financially independent from MOT. It established a tolling scheme for the highways with basic toll rates and a regular adjustment scheme. The toll rates and the projected annual traffic growth will generate increasing toll revenues to sustain and enhance VEC's financial capacity. Through this project, as well as previous support from ADB and other development partners, VEC's capacity and growth rate was projected to be 10% for 2019–2020, 8% for 2021–2025, 5% for 2026–2030, and 3% for 2030 and after.

expertise have been substantially developed across expressway planning, legal and regulatory framework, corporate finance management, business development plans, project implementation management, safeguard planning and implementation, expressways' O&M, asset management, and private sector involvement. This validation assesses the project likely sustainable.

III. OTHER PERFORMANCE ASSESSMENTS

A. Preliminary Assessment of Development Impact

27. The PCR rated the project's development impact satisfactory. The project contributed to sustainable economic growth and strengthened connectivity with the PRC and along the Kunming–Hai Phong Transport Corridor. In 2016, the gross domestic product per capita reached $3,185 in Vinh Phuc; $1,341 in Phu Tho; $1,228 in Yen Bai; and $1,939 in Lao Cai. The border trade at Lao Cai increased to $1,495 million in 2016, much higher than the target of $800 million. In 2016, the average poverty incidence decreased to 11.2% in the project area, exceeding the target of 15.0%. In 2016, all poverty incidences improved, relative to their respective baseline levels. Also, against the target of 70%, the actual number of new small and medium businesses and employment for local people in project influence area increased by an average of 128%. Province-specific increases were 121% for Vinh Phuc, 234% for Phu Tho, 65% for Yen Bai, and 95% for Lao Cai. From 2008 to 2015, a subproject of ADB’s TA on fighting HIV/AIDS in Asia and the Pacific was implemented to reduce HIV incidence along the project highway during and after construction, and to mitigate the increased risks of illicit drug use and human trafficking. This validation assesses the development impact of the project satisfactory.

B. Performance of the Borrower and Executing Agency

28. The PCR rated the performance of the borrower and the executing agency satisfactory. The government as the borrower, represented by the Ministry of Finance and MOT, performed their functions in a timely and responsible manner. Project progress at key stages of implementation was facilitated by the borrower's supervision and coordination. VEC, as the executing agency, arranged counterpart funding and made appropriate institutional arrangements. NEPMU was staffed with the expertise required for the project. Adequate technical and administrative authority was delegated by VEC to NEPMU for expeditious decisions at the local level. Supported by the PSC and monitoring consultants, the capacity and performance of VEC and NEPMU in designing and implementing large and complex highway projects gradually improved as they gained experience during implementation. The O&M of the highway project was well arranged at completion. At loan closing, there were several loan and project covenants with partial compliance. VEC is expected to take appropriate actions on these items (para. 9). This validation assesses the performance of the borrower and the executing agency satisfactory.

C. Performance of the Asian Development Bank

29. The PCR rated ADB's performance satisfactory. ADB worked closely with the borrower, VEC, NEPMU, and related stakeholders to ensure the project's timely preparation, approval, and implementation to the extent possible. It was responsive and flexible on the requests made by the borrower and the VEC, such as the extension of loan closing date and provision of additional loans. ADB was closely involved in identifying and assessing implementation issues. It effectively resolved the identified issues and expedited implementation progress. Throughout project implementation, 39 project review missions were fielded, including an inception mission in 2008, a midterm review mission in 2013, 12 special missions on the LAR, and a completion review
mission in 2019. ADB’s project team held regular training for the VEC and NEPMU staff, consultants, and contractors on project management and safeguard compliance.

30. The translation of environmental and social requirements to project documents was adequate. Key environmental and social requirements were outlined in the summary EIA of 2007 and in the report and recommendation of the President (RRP). The EIA was of satisfactory quality and had adequate environmental management and monitoring plans. During project preparation, there were consultations with affected persons and other stakeholders. Meetings were adequate with local disclosure of documents and comprised project information disclosure. During missions, ADB gave detailed feedback to VEC on issues identified, and corrective actions to ensure the project's safeguard issues were resolved according to ADB's requirements. This validation assesses ADB's performance satisfactory.

IV. OVERALL ASSESSMENT, LESSONS, AND RECOMMENDATIONS

A. Overall Assessment and Ratings

31. The PCR rated the project successful. This validation assesses the project relevant, based on its alignment with the government's and ADB's strategies and policies, design appropriateness, and timely and appropriate responses to actual project needs emerging from implementation. It was effective as it largely achieved its planned outputs and intended outcome. The project was efficient due to the reevaluated EIRR exceeding the benchmark. Financial, operational, and institutional aspects indicate the likely sustainability of the highway project. Overall, this validation assesses the project successful.

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B. Lessons

32. The PCR identified three lessons. First, project preparation needs to be strengthened, especially the detailed design and cost estimates. It is important that the project cost contingencies be well estimated based on the actual country situation and practice. Second, to strengthen the prequalification for both international and domestic contractors, ADB and the government need to study the civil works packaging and develop programs to foster the market for private contractors. Third, the use of ADB loans as advance funds to finance LAR should be closely evaluated for future projects to avoid extended winding-up period caused by issues relating to withdrawal applications and liquidation of the advance funds.
33. This validation supports the lessons indicated and offers additional lessons. First, there are merits in utilizing a smaller TA loan for project preparation of a much larger investment loan, as opposed to including project preparation as part of the investment loan. This approach may accrue substantial savings to a borrower in commitment charges and other financial costs that otherwise would have been incurred if project preparation had been financed under the investment loan. Second, a TA loan for investment loan project preparation is expected to enable the detailed design and cost estimation to be more accurately undertaken before signing the investment loan. When timing a TA loan for such a purpose, developing a realistic implementation plan and timeframe is important. When the detailed design and cost estimation delivered by the TA loan are substantially after the appraisal and approval of the ensuing investment project, these potentially lead to the need for revising the detailed design and cost estimation, or additional financing.

34. Third, a holistic assessment of project context, adequate stakeholder consultations, and a flexible approach without strict adherence to established preparation practices are important to ensure that a project will serve the best interest of local population. In this case, although there was a difference in compensation policies between ADB and the government, a balanced policy was accepted (para.19). Continuous policy dialogues, close collaboration, and timely communication among stakeholders ensured effective and smooth resolution of resettlement and compensation issues. Fourth, to avoid delay and minimize impacts on the living standards of affected households, it is important to ensure that an IRP is properly designed and timed so that it is ready for implementation before the affected households are displaced from their assets. In addition to compensation, it is important to include measures to provide transitional support, such as land preparation, credit facilities, training, among other things. Diversification of livelihood options and income sources can help better cope with displacement. Fifth, strong political will and commitment at all levels of government authorities have a decisive impact on the effective and efficient implementation of large-scale LAR activities. It is important for an executing agency to be proactive and work closely with local authorities to resolve identified issues on the ground.

C. Recommendations for Follow-Up

35. The PCR made the following recommendations. First, given the common issues found in ADB-financed expressway projects in Viet Nam, an in-depth analysis should be undertaken to assess and document the projects design, formulation, and implementation, as well as its socioeconomic impacts. Second, a follow-up survey is needed to assess the impacts and make recommendations on government interventions to maximize the socioeconomic benefits, especially to the poor. This validation supports these recommendations.

V. OTHER CONSIDERATIONS AND FOLLOW-UP

A. Monitoring and Reporting

36. During implementation, quarterly progress reports, audited project financial statements, and environmental and social monitoring reports were submitted generally on time. However, no EMRs were submitted during the operation phase. A project performance monitoring system was established, and a baseline survey was conducted. There were no survey and evaluation conducted afterwards, due to the lack of required consultants in the PSC team. During the preparation of the borrower’s PCR, NEPMU with PSC’s assistance, collected some data related to socioeconomic development impact.
B. Comments on Project Completion Report Quality

37. The PCR was well prepared and consistent with the pertinent guidelines. It provided a comprehensive description of the project design and implementation process and presented an objective and convincing assessment of the achievements. Major implementation issues were clearly explained. The environmental and social safeguards were succinctly summarized. The economic and financial reevaluation was well prepared, with the supporting economic analyses spreadsheet clearly presenting the assumptions, parameters, and calculation details. The findings, lessons, and recommendations were evidence-based, relevant, and useful. This validation assesses the quality of the PCR satisfactory.

C. Data Sources for Validation

38. Data sources for this validation include the PCR, the original RRP and its linked documents, the RRP for additional financing and its linked documents, loan and project agreements, mission back-to-office reports, safeguard assessment, environmental and social monitoring reports, national strategies, and policies, and ADB strategies, policies, and guidelines.

D. Recommendation for Independent Evaluation Department Follow-Up

39. The PCR, dated February 2020, suggested that a project performance evaluation report may be prepared in 2020 when the project highway will have been fully operational for 5 years. Considering the ongoing COVID-19 pandemic, this validation notes that it would be more feasible to schedule the performance evaluation for 2022 or later.