



1. Project Data

Project ID P114077	Project Name CM - Lom Pangar Hydropower Proj. (FY12)	
Country Cameroon	Practice Area(Lead) Energy & Extractives	
L/C/TF Number(s) IDA-50860	Closing Date (Original) 31-Dec-2018	Total Project Cost (USD) 122,365,629.52
Bank Approval Date 27-Mar-2012	Closing Date (Actual) 28-Jun-2019	
	IBRD/IDA (USD)	Grants (USD)
Original Commitment	132,000,000.00	0.00
Revised Commitment	132,000,000.00	0.00
Actual	121,034,628.19	0.00

Prepared by Dileep M. Wagle	Reviewed by	ICR Review Coordinator Ramachandra Jammi	Group IEGSD (Unit 4)
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2. Project Objectives and Components

a. Objectives

The Project Development Objectives, as mentioned in the Financing Agreement (FA), as well as in the PAD (p.18), were to "increase hydropower generation capacity and reduce seasonal variability of water flow in the Sanaga river and to increase access to electricity".

For the purpose of the review, the objectives of (a) increasing hydropower generation capacity, (b) reducing seasonal variability of water flow, and (c) increasing access to electricity, will be evaluated individually.



b. Were the project objectives/key associated outcome targets revised during implementation?

No

c. Will a split evaluation be undertaken?

No

d. Components

1. Lom Pangar Regulating Dam: (estimated cost at appraisal: US\$216 million, of which US\$115 million from IDA; actual IDA cost: US\$110.86 million)

This component financed the construction of the Lom Pangar Dam on the Lom river. The dam was intended to create a reservoir with a useful capacity of about 6 billion m³. Planned activities to be funded were: (a) the dam engineering, procurement, construction and construction management; (b) price contingencies for construction contracts; (c) preparatory works; and d) owner's engineer services.

2. Lom Pangar Plant and Transmission Line (estimated cost at appraisal: US\$62 million, none of which financed by IDA; actual cost: Unavailable, as activities are still under way)

This component was intended to construct a 30 MW power plant with four turbines at the foot of the dam, as well as a transmission line and provision for rural electrification in the Eastern Region along the transmission line corridor. The rural electrification sub-component would connect 13 localities between the hydropower plant and Bertoua, enabling the electrification of around 2,400 households. The component also included social mitigation measures related to the power plant and transmission line.

3. Environmental and Social Measures: (estimated cost at appraisal: US\$73 million, of which US\$6 million from IDA; actual IDA-financed cost: US\$1.45 million)

This component was intended to ensure that the Environmental and Social (E&S) impacts of the project were mitigated as described in the Environmental & Social Management Plan (ESMP), and the Resettlement Action Plan (RAP) for the dam. The following sub-components were covered: (a) E&S management of construction sites, (b) management of the reservoir and cumulative downstream mitigation, (c) social mitigation, (d) management of the Deng Deng forest, (e) technical audits of E&S measures, (f) ESMP implementation, (g) RAP implementation, and (h) local development plans (LDPs).

4. Technical Assistance and Project Management: (estimated cost at appraisal: US\$42 million, of which US\$11 million from IDA; actual IDA cost: US\$8.59 million)

This component was intended to assist the Electricity Development Corporation (EDC) in improving project management and operation, and the management of water resources in the Sanaga River Basin. The component included the following activities: (a) Technical assistance, (b) strategic communication and consultation, and (c) project management.



e. Comments on Project Cost, Financing, Borrower Contribution, and Dates

Project Cost:

The ICR does not provide an adequate accounting of project costs over its implementation period. Final costs at project closing have been presented only for the IDA-financed portion of the project, notwithstanding the fact that IDA finance accounted for only US\$132 million of the total costs of the project (US\$494 million), estimated at appraisal. That said, it appears that the actual project costs were higher than at appraisal, mainly due to an increase in the cost of the dam, with most of the additional costs being covered from the borrower's resources.

Financing: The sources of funding for this project at appraisal consisted of IDA resources of US\$132 million, augmented by US\$29 million from the African Development Bank (later raised to US\$65.9 million), US\$79 million from the French Agency for Development, US\$15 million from the Central African States Development Bank and US\$40 million from the European Investment Bank.

Borrower Contribution: The Borrower contributed US\$199 million to this project. Actual disbursements by project closing amounted to a much lower figure of US\$121 million.

Dates: The closing date of the project was extended from December 31, 2018, to June 28, 2019, to allow the completion of some on-going activities. Despite the extension, activities under Component 2 could not be completed by project closing, as one of the co-financiers could not disburse on time. However, the Bank did not further extend the project on this account, as it was not involved in financing activities under this component.

3. Relevance of Objectives

Rationale

Country Context: Cameroon has the third largest hydropower development potential in Sub-Saharan Africa, estimated at over 12,000 MW, with the Sanaga river providing nearly half of the untapped potential. However, at the time of project preparation, installed electricity generating capacity in Cameroon from all sources amounted to only 933 MW, 77 percent of which from hydro. Cameroon was a classic example of an African country whose economy was held back by an infrastructure deficit. Significant underinvestment in infrastructure had eroded the country's competitiveness and growth prospects, and estimates suggested (PAD, p. 1) that addressing Cameroon's power deficiencies could enhance per capita economic growth by as much as 1.3 percentage points.

An important step towards developing Cameroon's unexploited hydropower potential was the construction of a regulating dam at the Lom Pangar site – which would increase the guaranteed all-season hydropower capacity on the river by some 40 percent. This would translate into the immediate addition of 120MW at existing downstream hydropower plants, as they would be able to also generate power during the dry season. In the medium term, the Lom Pangar dam would allow for further downstream development of large-scale hydropower plants by ensuring firm all-season water flows.



Alignment with Strategy: The project supported the objectives of the Government of Cameroon’s “Vision 2035” to achieve shared growth, reduce poverty and create jobs through increased industrialization and improved productivity. The Government’s Growth and Employment Strategy Paper 2010-19 aimed to increase non-oil growth by investing – among other things - in key infrastructure. Developing the country’s vast hydropower resources, starting with the current project, as enabling infrastructure for growth and poverty reduction, was a strategic pillar of “Vision 2035”.

The project’s objectives were consistent with the strategic objectives of the Bank Group’s Country Assistance Strategy for 2010-2013, which centered on inclusive growth through improved competitiveness and better service delivery. IDA support to competitiveness was focused on increasing infrastructure investments in the energy, transport and communications sectors, including the Lom Pangar Hydropower project. The project’s objectives remained consistent with the World Bank’s strategy at the time of project closing. Of the 12 objectives of the Bank Group’s Country Partnership Framework (CPF) for 2017-21 (Section 3, D), two of the objectives – spanning two focus areas - were centered on: (a) Improved access to local infrastructure, and (b) Increased national availability of electricity. The former included access to electricity, particularly in rural areas and the northern region; and the latter, additional generation of electricity, with a focus on renewable energy and public private partnership (PPP) arrangements, plus a reduction in power outages.

Based on the above, the Relevance of Objectives is rated High.

Rating
High

4. Achievement of Objectives (Efficacy)

OBJECTIVE 1

Objective

“To increase hydropower generation capacity”

Rationale

Theory of Change:

A broad causal link can be drawn between the project’s activities, which included (a) construction of a dam on the Lom river, (b) construction of a plant and transmission line, (c) putting into place environmental and social measures, and (d) providing technical assistance (TA) and steps to strengthen project management, and the expected outcomes in terms of an efficient regulation system of the Sanaga river water flow, increased quantities of electricity generated and transmitted to the urban centers of Bertoua and environs, satisfactory environmental & social (E&S) management of the Lom Pangar site and related resettlement, and improved capacity of government agencies to oversee the electricity sector. These in turn would be linked to the long-term outcomes of increased quantity and quality of High Voltage (HV) electricity from the Sanaga Basin, improvements in quality of electricity services to more people in Cameroon, especially in the Bertoua region,



greater sustainability of the environmental and social setting around the Lom Pangar site, and more efficient management of the electricity sector, especially the Sanaga Basin

While the activities themselves appear appropriate to achieve the desired outcomes, the theory of change discussion does not specifically analyze whether they were of adequate scale to generate a critical mass for change. However, the discussion does encompass an assessment of counterfactuals, concluding that the expected positive impact from the project and the downstream dams of the Sanaga Basin could not have been achieved otherwise during the project implementation timeline (ICR, para 16).

Outputs:

The following intermediate outcomes were achieved:

- Construction of the Lom Pangar power plant was initiated but not completed by project closing. A 30 MW power plant was to be built at the foot of the dam. However, on account of delays in financing from AfDB and BDEAC (Central African States' Development Bank), construction of this activity was way behind schedule and likely to be completed only by the end of 2021, instead of by Year 5 of the project (FY17) as originally envisaged at appraisal. The four new turbines are expected to be commissioned in May, July, September and November of 2022.

Outcomes:

The objective of increasing hydropower capacity was partially achieved. The regulation dam was completed and commissioned 15 months ahead of the initial project closing date, being commissioned in June 2017. This ensured the regulation of the Sanaga River, allowing generation to increase in the downstream plants by up to 450 GWh per annum, equivalent to an additional installed capacity of 120 MW (thereby meeting the target). The quantity of energy produced by the downstream power plants (Song Loulou and Edea), which surged after the partial impounding in 2016, increased by 19 percent in 2017 over the 2015 level. Electricity generation at these two plants increased electricity generation by 684 GWh – exceeding the target of 601 GWh. However, the expected 30 MW incremental capacity from the four new turbines to be installed at the foot of the dam did not take place on schedule, and the outcome target of 223 GWh of electricity to be generated by this capacity was not fulfilled by close of project.

Based on the above, efficacy of this objective is rated **Substantial**.

Rating

Substantial

OBJECTIVE 2

Objective

“To reduce seasonal variability of water flow in the Sanaga river”

Rationale

Outputs:



- Commissioning of the Lom Pangar Dam: Partial impoundment of the dam took place in September 2015, followed by complete impoundment in June 2016. Provisional reception of the reservoir dam took place on June 30, 2017, and the dam was formally commissioned two years later, in June 2019.
- Dam Safety Panel's Recommendations: The recommendations of the Dam Safety Panel were implemented in timely manner, from 2012 onwards.
- The Annual Expert Environmental and Social Monitoring Report was disseminated and made publicly available on the internet in 2012.

Outcomes:

The project was successful in achieving its objective of reducing seasonal variability of water flow in the Sanaga river. On account of the dam construction the level of guaranteed all-season water flow on the river was increased by 44.4 percent from a base line of 720 m³ (cubic meters) per season, reaching a level slightly in excess of the target of 1040 m³. After the complete impoundment of the reservoir in June 2016, it became possible to store a quantity of water of 6.284 billion m³ by 2017, allowing a flow of water of about 1,050 m³ to Song Mbengue for 100 percent of the time. From 2016 to 2019, average flow during the low-water period surpassed the targeted water flow level in each year.

Based on the above, efficacy of this objective is rated **High**.

Rating
High

OBJECTIVE 3

Objective

"To increase access to electricity"

Rationale

Outputs:

- Construction of a 105 km transmission line in 90 kV, connecting the Lom Pangar plant to HV/MV sub-station in Bertoua was expected to be completed by FY17, but was delayed and is now expected to be completed only by June 2022. Construction of a 200 km MV line from the Bertoua substation to two other substations to be built in Batouri and Abong-Mbang has commenced and is also expected to be completed by June 2022.
- Activities are under way to electrify 150 localities in the Eastern Region, including the headquarters of 9 administrative units and the connection of 10,000 new subscribers.

Outcomes:



The delay in constructing the 105 km transmission line to Bertoua and the 200 km MV line to Batouri and Abong-Mbang meant that the expected increase in access to electricity by household connections (target: 2,400) could not be achieved. It is anticipated that the target will be achieved by mid-2022.

- Despite this setback, the core indicator for number of direct project beneficiaries was exceeded. At project closing, there were an estimated 5.9 million beneficiaries (target of 5.14 million), based – according to the ICR (p.17) - on an estimate of 1.18 million connected households in the Southern interconnected network, benefiting from improved electricity production at the Song Loulou and Edea plants. Attribution to the project is however not entirely clear since the PAD (results matrix, Annex 1) had predicated this indicator on the assumption that the above-mentioned 2,400 new connections would be achieved, plus AES-SONEL's 22,000 existing customers in the Eastern Grid and the existing 625,000 consumers of the Southern Integrated Grid would be receiving better services. The delay in construction of the transmission line meant that the connection to the Eastern Grid would not have taken place within this time frame.

Based on the above, efficacy of this objective is rated **Modest**.

Rating
Modest

OVERALL EFFICACY

Rationale

The efficacy of individual objectives ranged from High for PDO2 to Modest for PDO3, with PDO1 being rated Substantial. The operation achieved its major objective of putting into place a regulating dam to control the flow of water on the Sanaga river and ensure all-season availability, thereby allowing existing, downstream hydropower capacity to be able to generate electricity during off-season months also. Progress was made towards ensuring an actual increase in generating capacity and in extending the transmission network to Bertoua and its environs. However this fell behind schedule, due to financing constraints, so that the objective of increasing access to electricity is likely to be realized in 2022, at the earliest. In light of this, overall efficacy is rated **Substantial**.

Overall Efficacy Rating

Substantial

5. Efficiency

Economic and Financial Efficiency:

Economic analysis of the project conducted at appraisal indicated an economic internal rate of return (EIRR) of 17.8 percent, and a net present value (NPV) of US\$411 million, discounted at 5 percent. Economic analysis



conducted in the ICR indicates a rate at project closing of 28 percent for the EIRR and an NPV of US\$445.6 million, discounted at a higher rate of 10 percent. Financial analysis was not conducted at appraisal. However, the ICR indicates a financial internal rate of return (FIRR) of 37 percent and a net present value of US\$1.6 billion at the discount rate of 3 percent. The ICR also indicates that fiscal impacts of the project were positive. Avoided fuel costs in the electricity sector and saving in the petroleum sector totaled an estimated CFA 13.5 billion per year in 2008 real prices, which would help offset the Cameroonian Government’s expenditures on operating subsidies to the energy utility.

Administrative and Operational Efficiency:

The project faced minor implementation delays, requiring the closing date to be extended by about six months. In addition, Component Two (the Lom Pangar plant and transmission line) could not be completed by project closing, for which an extension was not sought, as financing was not being provided by IDA. The total administration cost, at 5.7 percent of the project cost at closing, was slightly higher than the 5.4 percent estimated at appraisal. The actual project cost was higher than estimated at appraisal, on account of an increased cost of the dam – but the ICR does not provide actual details, as most of the additional was covered by the borrower’s resources.

Based on the above, efficiency is rated **Substantial**.

Efficiency Rating

Substantial

a. If available, enter the Economic Rate of Return (ERR) and/or Financial Rate of Return (FRR) at appraisal and the re-estimated value at evaluation:

	Rate Available?	Point value (%)	*Coverage/Scope (%)
Appraisal	✓	17.80	0 <input checked="" type="checkbox"/> Not Applicable
ICR Estimate	✓	28.00	0 <input checked="" type="checkbox"/> Not Applicable

* Refers to percent of total project cost for which ERR/FRR was calculated.

6. Outcome

The project’s objectives were highly relevant to the Government’s strategy, as well as to the World Bank’s country strategy and current Country Partnership Framework. Overall efficacy was found to be Substantial, as the project achieved its major objective of ensuring all-season water flow of the Sanaga river, but fell behind schedule towards achieving its other objectives of building additional electricity generating capacity and extending the transmission network, so as to enhance access to electricity. Efficiency was rated Substantial, on account of some shortfalls in administrative and operational efficiency. Taking all of this into account, the overall project outcome rating is **Satisfactory**.



a. Outcome Rating

Satisfactory

7. Risk to Development Outcome

The key risk pertains to the availability of financial resources that will be available to EDC (Electricity Development Corporation) to ensure adequate oversight and maintenance of the dam and the regulatory reservoir, and to address environmental and social (E&S) management risks. Though the project did contribute to building the technical and institutional strength of EDC (via Component 4), the adequacy of EDC's budget resources remains in question, especially in light of (a) the Government's overall tight finances, and (b) delays in coming to closure on with the establishment of a transparent mechanism to settle water rights issues and to allocate on a regular and timely basis the revenue collected among key stakeholders benefiting from the regulation provided by the dam.

Another risk relates to the imbalance between the enormity of E&S risks and the low level of commitment and resources earmarked to address them. Though construction of the dam was completed ahead of schedule, other activities to mitigate environmental risks made less progress, especially completion of the Tourake bridge and creation of a PPP unit to ensure oversight of the DDNP (Deng Deng National Park). Two mitigation measures are already in place: (i) the presence of a bilateral donor (AFD), who will provide support, especially to DDNP, and (ii) a new TA project to address environmental issues in the Sanaga basin.

8. Assessment of Bank Performance

a. Quality-at-Entry

The design of the project benefited from the World Bank's experience in the sector, including lessons from similar Bank-financed hydropower projects, such as the Bujagali project in Uganda and the Nam Theun 2 project in Laos. In line with prior experience, the project development considered alternatives and design options and environmental and social mitigation measures in an integrated way with the economic, technical and financial dimensions of the project. The Lom Pangar project was identified as the least-cost generation option in feasibility studies conducted in the early 1980s, and this was revalidated during project preparation. Since limited management experience had hindered implementation of complex infrastructure projects in Cameroon, an extensive capacity building program on sustainable development of such projects was started during project preparation. The initiative also drew on the experience of the Chad-Cameroon pipeline project, which underlined the importance of ownership and commitment to sensitive reforms, and recognition of administrative capacity realities and limitations. Finally, the World Bank was able to use its convening power to mobilize other bilateral and multilateral donors that supported the project, including EIB, AFD, AfDB and BDEAC.



The project was built on an alignment of the borrower's and the World Bank's interests. The country's strategy for Growth & Employment (2010-19) aimed to increase growth through a variety of measures, of which investments in key infrastructure was an important pillar. In the energy sector, actions included increasing hydropower production and renewable energy, boosting energy efficiency and reducing losses through improved transmission and distribution. The World Bank was able to identify the commonality of interests with the borrower so as to develop the project.

The Results Framework and M&E arrangements were generally adequate, but there was room for improvement. The PDO indicators were strongly focused on the achievement of the project's goals in terms of water regulation, electricity production, transmission and distribution, and access. However, the sustainability of these results depended upon meeting E&S and technical capacity goals, relating to activities financed under Components 3 & 4. There were in fact no adequate performance indicators covering these activities in the results matrix; as a result, their implementation of these activities turned out to be weak.

Implementation arrangements were complex, with many internal and external stakeholders, but the coordination set-up was reasonably strong. The project provided for a Steering Committee chaired by the Secretary General in the Prime Minister's office, which included representatives from the presidency and the PIU, playing an oversight role that allowed all stakeholders to provide their effective contribution to the project's implementation.

Quality-at-Entry Rating Satisfactory

b. Quality of supervision

The project appears to have been adequately supervised, with 13 missions undertaken over the 6 years since effectiveness, and with support from field-based staff and task team leaders in the country office. Interaction between the Bank team and the relevant government agencies, as well as with the other co-financiers, was strong. Project supervision was strengthened by regular advice from two panels of experts – dam safety and E&S. Meetings with these experts during multiple field visits was critical to the task of moving the project along and achieving results.

The Bank team ensured the timely recruitment of the construction company and the owner's engineer, which proved to be very helpful to achieving implementation progress of the dam and reservoir construction. Notwithstanding early difficulties in collaboration, a clear division of responsibilities and contractual framework between the construction company, owner's engineer and the PIU was established, setting the stage for accelerating implementation of Component 1, and allowing for timely completion of the dam and regulating reservoir.

Environmental and Social (E&S) challenges affected project implementation throughout, but proved difficult to deal with on account of the inadequacy of resources allocated by the concerned project stakeholders. Performance in addressing these issues was rated Moderately Unsatisfactory in Implementation Status & Results Reports (ISRs) throughout the implementation period of the project. The Inspection Panel was brought in in December 2017, in response to a request filed by two former workers, relating to working hours, conditions of work, etc. The issue was dealt with by the Bank through



preparation of a detailed Action Plan to review and address workers' grievances, and hiring of a local consultant to support supervision.

As regards fiduciary aspects, the ICR indicates (p.41) that the Bank team could have acted more promptly to support the financial management (FM) of the operation. Reporting of FM performance was flawed and recommendations were not followed up though financial management was a known weak spot throughout the period of project implementation. Though ISRs reported mostly satisfactory ratings for FM, PIU staff revealed that the conduct of FM operations and transactions had been challenging throughout the period – a fact that the Bank team acknowledged prior to project closing, in the March and June supervision missions.

Quality of Supervision Rating

Moderately Satisfactory

Overall Bank Performance Rating

Satisfactory

9. M&E Design, Implementation, & Utilization

a. M&E Design

The design of the M&E system reflected the results chain and included relevant PDO-level and intermediate-level indicators to monitor the progress of activities and outcomes related to energy infrastructure. One aspect that was relatively neglected was the measurement of outcomes related to management of environment and social (E&S) risks. Despite the fact that the project had components devoted to addressing E&S and capacity building issues, the Results Framework had no indicators to gauge performance in these areas.

b. M&E Implementation

The PIU in the EDC was responsible for overall management and implementation of the project M&E framework. To ensure efficient data for monitoring and evaluation of outcomes, EDC was to coordinate with government agencies, donors and other stakeholders. A comprehensive approach to M&E was introduced at inception; including agreement with the implementing agency and Government on results indicators. Data collected was to be reported to the Steering Committee and donors through progress reports compiled by the PIU. In addition, M&E implementation was conducted through the numerous (15) Aide Memoires and ISRs released by the Bank team during project implementation. ISRs, prepared twice a year, drew upon the data collected, including reports by the dam safety and E&S panels, which played an advisory role regarding the quality of work in the construction of the dam and in addressing the E&S challenges.



c. M&E Utilization

Data collected for M&E was used to monitor the status of the project. Project implementation relied heavily on M&E data and information conveyed periodically to the management entities. Reports prepared by the technical and E&S panels were central to identifying corrective measures to address unexpected challenges in the dam construction and other obstacles.

M&E Quality Rating

Substantial

10. Other Issues

a. Safeguards

Environmental and Social Compliance

The project was classified as Environmental Category A, triggering the following policies: Environmental Assessment (OP/BP 4.01), Natural Habitats (OP/BP 4.04), Pest Management (OP/BP 4.09), Physical Cultural Resources (OP/BP 4.11), Involuntary Resettlement (OP/BP 4.12), Forests (OP/BP 4.36) and Safety of Dams (OP/BP 4.37). A comprehensive Environmental & Social Assessment, including an Environmental & Social Management Plan (ESMP), four Resettlement Action Plans (RAPs), a Pest Management Plan, a Process Framework and a number of technical annexes were prepared and disclosed in the InfoShop and in the country. It should be mentioned that the Deng Deng National Park (DDNP) was identified as an environmental offset for the footprint of the Lom Pangar dam and reservoir and it was expected that, together with accompanying measures, it would ensure the viability of the Deng Deng forest's population of endangered large primates. Secondly, the adaptation of the Chad-Cameroon pipeline, which had to be partially flooded, was managed in accordance with Bank Group standards, with the Cameroon Oil Transportation Company carrying out an Environmental and Social Impact Assessment for the adaptation works, and also updated the Area Specific Oil Spill Response Plan.

As mentioned in Section 8(b), the Inspection Panel received a request for inspection in December 2017 on behalf of two former workers of the project, relating to various issues including working hours, conditions of work and occupational safety. In response, the Bank prepared a detailed Action Plan to review and redress workers' grievances, in addition to an outreach campaign to project workers, and hired a local consultant to support supervision of the proposed grievance redressment mechanism. In March, 2018, the Panel made a recommendation to the Board that the project need not be investigated, which was accepted by the Board.

Compliance with legal norms in the management of the Lom Pangar work sites improved over time, as a result of the involvement of ATESI – an association of private entities which had contracted with EDC to prepare quarterly M&E reports on the E&S aspects of the project during the implementation period, as well as the review by the World Bank's Inspection Panel. Initially, 23 cases of noncompliance were opened against the construction company (CWE) after the first E&S audit; which dropped to below 10 by the third audit, and steadily decreased to 2 by the twelfth audit in 2017. By project closing, all construction sites had been properly demobilized and rehabilitated by CWE, the military and police were on the ground to ensure the safety of people and infrastructure on the site, most of the social complaints had been addressed, and



the remaining ones were being handled by two programs set up – a Community Compensation and Reinstallation Program and a program for the livelihood restoration for affected people.

Finally, by project closing, EDC had prepared a manual establishing the environmental and social standards during the period of dam and reservoir exploitation. The manual established the international standards, updated the ESMP for the operational phase and provided guidance on dam and reservoir operation to staff in charge of environmental monitoring. The manual also defined the Environmental Management System of the operator’s activities to continuously improve the E&S management of the dam’s hydroelectric development.

b. Fiduciary Compliance

The project faced major financial management (FM) weaknesses during implementation. The quality of quarterly FM reports to the World Bank was below standard. Reports were often untimely and required amendments before being deemed acceptable (ICR, p.37). The ICR also reports that the Bank team’s March 2019 supervision mission, just prior to project closing, drew attention to the non-submission of the project budget to the Bank, resulting in ineffective monitoring of project activities and exposing the project to a high risk of ineligible expenditures. The final supervision mission, in June 2019, rated the FM system Unsatisfactory due to the fact that contractual obligations were not respected with regard to financial management and the audit of the 2018 accounts was not started on time. The weakness of the project’s FM system to some extent mirrored the governance challenges in the management of the country’s public sector, which has been characterized by limited internal controls, weak accounting and reporting and an absence of external audits.

c. Unintended impacts (Positive or Negative)

d. Other

11. Ratings

Ratings	ICR	IEG	Reason for Disagreements/Comment
Outcome	Satisfactory	Satisfactory	
Bank Performance	Satisfactory	Satisfactory	
Quality of M&E	Substantial	Substantial	
Quality of ICR	---	Substantial	



12. Lessons

IEG derives the following lessons, drawn from the ICR:

- **For a project implemented in the context of weak governance and a breakdown of public accountability, the World Bank needs to step up its mitigation measures in fiduciary oversight of project implementation:** There is a stark contrast between the mostly satisfactory achievement of the project's outcome and the largely unsatisfactory financial management of the project's resources. This points to limitations to the ability of legal covenants and implementation arrangements to transform weaknesses in a borrower's systems of management of public resources. The most the World Bank can do in such circumstances is to strengthen mitigation mechanisms and provide technical assistance in parallel to the PIU and other related agencies.
- **The borrower's commitment to a project's results and objectives is key to their achievement during implementation:** Bank teams need to be attentive to the borrower's commitment to a project and monitor risk mitigation measures accordingly. For the current project, while the country context was not optimal, it was clear that the borrower was ready to provide every contribution needed to move the operation forward. Despite tight budget constraints, the borrower came up with the needed counterpart funds, albeit with some delays – as when BDEAC faced internal financial difficulties, the Government joined hands with AfDB to provide the advances to launch the construction of the hydropower plant and transmission line. Throughout project implementation, the borrower provided counterpart funds that allowed the project to move forward in critical areas such as E&S risks, social welfare of works, etc.
- **For projects with a dam construction component, reservoir impoundment must be prepared way ahead to allow for the preservation of timber wealth:** Forest sites planned to host hydroelectric projects should be surveyed 3-6 years ahead of the effectiveness date, to allow time to organize timber removal.

13. Assessment Recommended?

No

14. Comments on Quality of ICR

The ICR is clearly written, concise and consistent with guidelines. It provides a good description of the project's activities, pictures of the dam and reservoir site, and a detailed theory of change. The analysis is broadly evidence-based. The ICR could have provided more detail on the project's environmental and social performance, particularly to clarify compliance of specific policies triggered. Also, when discussing Bank performance, particularly the quality of supervision, some additional information – for instance on the adequacy of supervision resources and inputs – would have been useful in support of its conclusions. Finally, as



mentioned in Section 2d, the ICR does not provide an adequate accounting on project costs: information on final costs at project closing being limited to the IDA-financed portion of project components,

a. Quality of ICR Rating
Substantial