

**Revision No. 2 May 18, 2017**

**ENVIRONMENTAL AND SOCIAL REVIEW SUMMARY (ESRS)**

**PROJECT Nachtigal # 37673**

Actions	Evidence of Implementation	Timing
<b>Performance Standard 1</b>		
1. NHPC will obtain provisional versions of Integrated Construction phase Environmental, Health & Safety and Social Management Systems (ESMS) from EPC contractors. The EPC contractors' ESMS shall include a system to conduct regular E&S inspections, quarterly internal audits and senior management reviews, and regularly report results with associated corrective actions to NHPC.	EPC Contractors' Integrated Environmental, Health & Safety and Social Management System documentation in form and content satisfactory to IFC.	Prior to first disbursement
2. NHPC will establish a system to collect and analyze data on the project's E&S performance during construction and operation. The information shall include, but not be limited to: (i) accident rates; (ii) consumption of energy and water; (iii) generation and treatment of hazardous and non-hazardous waste; (v) wastewater quality analysis; (vi) turbidity of the Sanaga river; (vii) air emissions; (viii) implementation of workers' training programs; (viii) epidemiological indicators; (ix) migrant influx.	Monitoring E&S parameters and protocols satisfactory to IFC.	Prior to first disbursement
3. NHPC will develop an E&S Management System (ESMS) in line with the requirements of IFC Performance Standard 1 to mitigate the E&S risks and impacts linked to the operation of the hydropower plant.	ESMS manual for the operation of Nachtigal HPP in form and content satisfactory to IFC.	Prior to commissioning
4. NHPC will ensure that its E&S team has the capacity to effectively manage the E&S risks and impacts linked to operation of the hydropower plant.	Job descriptions, training plan, CVs and contracts of experts satisfactory to IFC.	Prior to commissioning
<b>Performance Standard 2</b>		
5. NHPC will document, implement and communicate its human resources (HR) policies and procedures in line with IFC Performance Standard 2 requirements.	NHPC HR policies and procedures manual. Provide evidence of communication to NHPC employees.	Prior to first disbursement
6. NHPC will implement a system to monitor EPC contractor and subcontractor's compliance with Cameroonian labor laws and IFC PS2 requirement. These shall include, but not be limited to: (i) internal work regulations - approved by the Ministry of Labor of Cameroon - communicated and explained to employees at the time of recruitment; (ii) workers covered by social security; (iii) workers provided with a copy of their contract; (iv) no personal identification retained against worker's will; (v) contractors' system to adequately record and compensate for overtime work; and (vi) workers' wages compliance with remunerations established by applicable collective bargaining agreements or official tariffs. If non-compliances are identified, NHPC will require contractors to take immediate corrective actions.	Applicable policies and procedures, and assigned staff and budget.	Prior to first disbursement
7. NHPC will ensure that EPC contractors and subcontractors have a system to verify workers' age and to ensure that no children below the minimum working	Applicable policies and procedures.	Prior to first disbursement

**Revision No. 2 May 18, 2017**

**ENVIRONMENTAL AND SOCIAL REVIEW SUMMARY (ESRS)**

**PROJECT Nachtigal # 37673**

age (15 years) is engaged in any type of work and no children between 15 and 18 years old is employed in hazardous work.		
8. NHPC shall ensure that EPC contractors make all workers aware of the existence of a worker grievance mechanism, in accordance with IFC PS2, managed by the EPC contractors with NHPC input, and shall facilitate access to it. EPC contractors shall regularly explain to workers the scope of the grievance mechanism (which type of complaints can be filed) and how the mechanism work.	Applicable policies and procedures, and assigned staff and budget, satisfactory to IFC.	Prior to first disbursement
9. NHPC shall implement a system to monitor workers' accommodations and services provided by EPC contractors to ensure it complies with contractual clauses and workers are provided a safe and healthy living environment. If non-compliances are identified, NHPC shall require EPC contractors to take immediate corrective actions.	Applicable policies and procedures, and assigned staff and budget.	Prior to first disbursement
<b>Performance Standard 3</b>		
10. NHPC shall obtain a spoil management plan from the civil works EPC contractor before beginning of the construction phase detailing the areas where the excavation material will temporarily stored and the measures to avoid erosion and deposition of sediments in the Sanaga river. Measures specific to permanent storage of spoil will be provided before the end of the construction phase.	Spoil management plan satisfactory to IFC.	Prior to first disbursement for temporary spoil storage and management and before the end of the construction phase for permanent spoil storage management
<b>Performance Standard 4</b>		
11. NHPC will ensure that EPC contractors' code of conduct and disciplinary procedures include the prohibition to engage in any type of sexual behavior with minors and any type of abuse or violence against women and girls.	Revised contractors' code of conduct and disciplinary procedures.	Prior to first disbursement
12. NHPC shall acquire or contract the necessary expertise so that NHPC grievance redress mechanism is able to handle complaints related to (i) misconduct of construction workers in host communities and (ii) potential abuses of private/public security forces, in particular complaints related to violence against women and girls. NHPC shall implement a communication campaign to explain what is the expected behavior of workers and private/public security forces in host communities, and how a member of the community can file a	Applicable policies and procedures, and assigned staff and budget, satisfactory to IFC.	Prior to first disbursement

**Revision No. 2 May 18, 2017**

**ENVIRONMENTAL AND SOCIAL REVIEW SUMMARY (ESRS)**

**PROJECT Nachtigal # 37673**

<p>related complaint. The system shall communicate outcomes to complainants and other relevant parties, keeping in mind confidentiality provisions and the need to protect victims.</p>		
<p>13. NHPC shall include gender specific mitigation measures within NHPC Migratory Influx Management Plan to ensure negative impacts on women due to the project are addressed.</p>	<p>Revised Migratory Influx Management Plan.</p>	<p>Prior to first disbursement</p>
<p>14. NHPC shall coordinate measures among all EPC contractors and subcontractors to ensure all workers have access to free HIV/AIDS consultation, screening, retroviral medication and means of protection to avoid the spread of the disease, and coordinate any awareness and communication campaign among sex workers and the population in general.</p>	<p>Applicable policies, plans and procedures, and assigned budget and staff both from EPC contractors and NHPC.</p>	<p>Prior to first disbursement</p>
<p>15. NHPC shall require EPC contractors to implement transportation management plans. Plans shall include: (i) speed limits; (ii) adoption of limits for trip duration to avoid overtiredness; (iii) avoidance of dangerous routes and times of the day to reduce the risk of accidents; (iv) requirements for vehicular maintenance; (v) requirements for drivers' licensing and training; (vi) alcohol tests and awareness campaigns to emphasize safety aspects among drivers; and where feasible (vii) the use of speed control devices (governors) and remote monitoring of driver action. These measures shall apply to all in-house and contracted transportation.</p>	<p>EPC contractors' transportation management plan satisfactory to IFC.</p>	<p>Prior to first disbursement</p>
<p>16. NHPC shall require the civil works EPC contractor to implement a blasting risk management plan, which shall include a communication strategy with Affected Communities to inform and manage perceptions of the risks of blasting activities. The plan shall include pre-blast and after-claim property condition surveys to prevent unfounded claims of damage caused by vibration and air overpressure. Property condition surveys shall include also properties along construction access roads in the hydroelectric facility DUP area to prevent unfounded claims of damaged due to vibrations caused by heavy trucks.</p>	<p>Civil works EPC contractor's blast management plan satisfactory to IFC.</p>	<p>Prior to first disbursement</p>
<p>17. NHPC shall commission a dam break analysis to (i) identify with certainty downstream infrastructure and people at risk; and (ii) identify appropriate warning systems and other measures to address flood events, rapid water level rises in case of peaking power production and potential dam failures.</p>	<p>Dam break analysis.</p>	<p>Six months before commissioning</p>
<p>18. NHPC shall develop and implement a dam safety emergency plan. The plan shall include a warning and alarm system to notify downstream communities when (a) regular operational downstream flows are expected to abruptly increase, and (b) in case of emergency releases. This system must assure that downstream communities understand (i) the different risk situations, (ii) what</p>	<p>Dam safety emergency (preparedness and evacuation) plan including responsible staff and budget. Evidence that the alarm system has been implemented and is operational, and</p>	<p>Two months before commissioning</p>

**Revision No. 2 May 18, 2017**

**ENVIRONMENTAL AND SOCIAL REVIEW SUMMARY (ESRS)**

**PROJECT Nachtigal # 37673**

actions to take and what behaviors to avoid, and (iii) who to contact in case of doubts or emergencies.	downstream communities have been appropriately trained.	
19. NHPC shall develop and implement a dam safety surveillance program.	Dam safety surveillance program including responsible staff and budget.	Two months before commissioning
20. NHPC shall complete a security risk assessment to identify the likely security threats during construction and operation that would require a response by security personnel, and the potential impact that such response might have on community members. Based on the outcomes of the security risk assessment, NHPC shall develop a security management plan.	Security risk assessment and management plan in form and content satisfactory to IFC.	Two months before start of construction
21. NHPC shall ensure that companies retained for the provision of security services during construction and operations have a system to ensure effective oversight and accountability of security personnel with respect to key PS 4 requirements (e.g., vetting, training in the use of force and appropriate conduct, procedures in the event of any incident or alleged violation)	Provisions to be included in contracts with private security forces, and procedures to control the implementation of contractual provisions, satisfactory to IFC.	Two months prior to start construction
22. NHPC shall retain a security officer to engage with the GoC to ensure public security arrangements do not pose a threat to the safety of workers and Affected Communities. The deployment, conduct, training, and incident follow-up of public security personnel shall be discussed with the army in depth and shall be ideally documented via a Memorandum of Understanding or similar, to ensure these are aligned with key PS 4 requirements.	Job description and CV of security officer. Memorandum of Understanding or documentation of engagement with GoC.	Two months prior to start construction
<b>Performance Standard 5</b>		
23. NHPC shall document and report to IFC the consultation process on the compensation matrix for sand miners and final agreements with PAP.	Documentation recording consultation process and agreements reached.	Two months prior to start construction
24. NHPC shall commission a Resettlement and Livelihood Restoration Completion Audit for all physically and economically displaced PAP demonstrating compliance with IFC PS5 or, if necessary, identifying any remaining gaps and corresponding corrective actions with budget and timeline for implementation.	Resettlement and Livelihood Restoration Completion Audit in form and content satisfactory to IFC.	Three years after commissioning
<b>Performance Standard 6</b>		
25. NHPC shall share results of the experimental electrofishing, details of catch-and-release program, and assess program effectiveness and efficiency to achieve long-term genetic mixing of fish stocks upstream and downstream of the proposed dam.	Report of results, details of program and evaluation of program to IFC satisfaction.	As soon as results are available (experiment is planned end of May 2017)

**Revision No. 2 May 18, 2017**

**ENVIRONMENTAL AND SOCIAL REVIEW SUMMARY (ESRS)**

**PROJECT Nachtigal # 37673**

26. NHPC shall appoint an independent fish expert with PS 6 experience for at least 3 years to evaluate if the proposed catch-and-release program is sufficient to maintain the genetic diversity of the fish populations and maintain the migratory fish populations. The independent expert shall also provide ongoing advice on the Biodiversity Action Plan-Fish and monitoring of Net Gain for the critical habitat fish species.	TOR, CV, and contract of independent expert to IFC satisfaction.	Two months prior to Board.
27. NHPC shall collect new fish data for a post-Lom Pangar HPP baseline (dry and wet season).	Report on fish baselines to IFC satisfaction.	July 2018