

DRAFT ENVIRONMENTAL AND SOCIAL ACTION PLAN (ESAP) – LEKELA NORTH PROJECT (THE PROJECT)

ESAP Item ID	E&S Issue	Required Action	Implementation Deadline	Completion Indicator(s)
EBRD PR 1/IFC PS1 Assessment and Management of Environmental and Social Impacts and Issues/Assessment and Management of Environmental and Social Risks and Impacts EBRD PR 10 Information Disclosure and Stakeholder Engagement				
1.1	The Company will develop and implement an appropriate environmental and social management system (ESMS) for the Project in line with ISO standards requirements. The ESMS will apply to the Project, and contractors where relevant, and incorporate the necessary policies, procedures and plans including those developed during the ESIA process.		Prior to First Disbursement	ESMS is place and implemented.
1.2	The Company (Lekela) will ensure that the Project EPC contractor prepares, and implements, a CESMP in conformance with commitments articulated in the Project ESMS Policy Manual. The CESMP shall contain KPIs, monitoring and reporting requirements.		Prior to the start of construction	CESMP, including KPIs and monitoring and reporting requirements, is available and approved by the Company and the Lenders.
1.3	The Company will develop and implement a Construction Oversight Management Plan reflecting all principles, guidelines, commitments and requirements for contractor management, especially those in the Company’s Employers E&S Requirements. This plan will include a contractor audit and inspection programme.		Prior to the start of construction	Construction Oversight Management Plan, incorporating audit and inspection programmes, is available and approved by the Lenders
1.4	The Company will ensure that sufficient staff and contractor resources are allocated to E&S management at all times. The Company shall employ, at a minimum, a project ESG Manager and a Community Liaison Officer, who will be supported by a Health, Safety and Environment (HSE) inspector employed by the Owner’s Engineer and, as needed, E&S consultants. The Company shall require the EPC and O&M contractors to appoint sufficient counterparts to these staff, including appropriate Health & Safety Officers to ensure satisfactory oversight of the entire construction labour force.		Prior to First Disbursement	Delivery of an updated organogram complete with names and roles/responsibilities.
1.5	The Company will implement and maintain the Project Stakeholder Engagement Plan, as well as the public grievance mechanism.		During all phases of the Project	Stakeholder Engagement Plan and public grievance mechanism implemented and records maintained.
EBRD PR 2/IFC PS2 Labor and Working Conditions				
2.1	The Company will develop and implement a Project Human Resources Policy and associated procedures. The Policy, and associated procedures, will apply to all Project workers. The Policy will be shared with contractors and these contractors will in turn be required to provide all workers – including sub-contractors – with written documentation concerning the terms and conditions of their employment, including their rights		Prior to first disbursement Prior to second disbursement/ong	Delivery of a Human Resources Policy, and associated procedures, satisfactory to Lenders Written documentation on labour and

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		under Egyptian labour law, as per PS/PR 2 requirements. This shall include a Worker Grievance mechanism that will be made available to all Project workers, irrespective of their employer.	oing	working conditions satisfactory to Lekela delivered to workers by contractors
2.2	The Company will ensure that any accommodation provided to Project workers is in line with EBRD and IFC guidelines for worker accommodation.		Prior to the start of construction and ongoing	Accommodation provided to workers in line with EBRD and IFC guidelines.
EBRD PR34/IFC PS3				
Resource Efficiency and Pollution Prevention and Control /Resource Efficiency and Pollution Prevention and abatement				
3.1	The Company will ensure that the EPC contractor develops and implements a waste management plan incorporating designated waste storage areas, procedures for the responsible management of solid and liquid wastes and spill prevention measures for fuel and hazardous substances.		Prior to the start of construction	Plan available and acceptable to Lekela
3.2	Should other wind power projects be developed nearby in parallel to the Project, the Company will consider potential cumulative impacts or risks associated with water use and waste generation and implement the necessary measures to avoid or reduce such risks together with other developers and/or the authorities.		Prior to and during construction	Potential cumulative water use and waste generation impacts/risks considered and addressed.
EBRD PR 4/IFC PS4				
Community Health, Safety and Security				
4.1	The Company will prepare and implement a security risk assessment and management plan consistent with PS/PR 4 requirements.		Prior to the start of construction.	Security risk assessment and management plan available and satisfactory to Lenders
4.2	The Company will require the EPC contractor to prepare an emergency preparedness and response plan (incorporating what to do in the case of flash flooding) and a construction transport safety plan.		Prior to the start of construction.	Plans available and satisfactory to the Company and Lenders
EBRD PR 6/IFC PS6				
Biodiversity Conservation and Sustainable Management of Living Natural Resources /				
6.1	The Company will expand on the existing ESIA by conducting an additional analysis using the raw pre-construction data to better understand the potential correlation between species-specific migratory bird flight movements and climatic factors (e.g., wind direction / speed, temperature, time of day). This type assessment will be carried out to assist in the development and optimization of the shutdown on-demand procedure that will be implemented during the operations phase, specifically with respect to the 13 priority bird species.		Six months prior to the start of operations	Provide the Terms of Reference (TOR) for this assessment Identify a wind wildlife specialist to undertake this work Provide the draft Assessment at least eight months prior to start of operations. Provide the final Assessment and integrate results into the Operations Phase Biodiversity Management Plan (BMP) six

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				months prior to operations.
6.2	The Company will undertake bias correction trials for scavenger removal and for searcher efficiency in both autumn and the spring seasons for the first three years of project operations (i.e. six per year) with the aim to develop correction factors. The project will also ensure that an expert wind-wildlife specialist is hired to develop fatality rate estimates with statistical correction factors and implement this work in the field. The company will also immediately begin identifying potential carcasses for the use in scavenger removal trials (avoiding the use of chickens) as the selection of the carcass is key to the accuracy of the results. The company will also maintain a freezer on the project site for the storage of carcasses.		Six months prior to the start of operations and during operations	<p>Develop TOR for this work 15-months before operations.</p> <p>Identify a wind wildlife specialist, acceptable to the lenders, one year prior to operations.</p> <p>Develop draft Procedures 9 months prior to operations.</p> <p>Develop final Procedures, in form and substance acceptable to the lenders, 6 months prior to operations and integrate into Operations Phase BMP.</p> <p>Identification of carcasses for the use in scavenger removal trials 6 months prior to operations.</p> <p>Procure a freezer 6 months prior to operations.</p> <p>Bias correction trials undertaken during first three years of operation</p>
6.3	The Company will develop an Operations Phase Biodiversity Management Plan (BMP), which will contain detailed protocols on (i) shutdown on-demand; (ii) fatality monitoring; (iii) bias corrections trails; (iv) calculating fatality rate estimates; (v) migratory bird monitoring; and (vi) adaptive management. Note that the migratory bird monitoring (v) will build on the assessment conducted in Action Item 6.1 and will be conducted with the aim to understand bird movement patterns with respect to climatic factors during the operations phase.		Six months prior to the start of operations	<p>Develop TOR for this work 15-months before operations.</p> <p>Identify wind wildlife specialist, acceptable to the lenders, one year prior to operations.</p> <p>Develop draft Operations Phase BMP 9 months prior to operations.</p> <p>Develop final Operations Phase BMP, in form and substance acceptable to the lenders, 6 months prior to operations</p>

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6.4	The Company will develop reporting procedures for the following: (i) reporting fatalities of priority bird fatalities to authorities and lenders in a timely manner (expected to be within 3-5 working days); (ii) in the event of a fatality of a priority species, a review of the incident by the responsible expert ornithologist; and, (iii) bi-annual reports to lenders following a template that details the results of in-flight monitoring, priority birds records, shutdown on demand incidents (including 'near-misses') and energy production lost due to shutdowns, any fatalities, results of bias correction trials and adaptive management.		Six months prior to the start of operations	Develop draft Procedures 9 months prior to operations. Develop final Procedures, in form and substance acceptable to the lenders, 6 months prior to operations and integrate into Operations Phase BMP.
6.5	The Company will finalize its Analysis of Cumulative Effects, expanding on the current text and including numeric fatality thresholds for the all priority bird population VECs, which, if exceeded, will trigger an adaptive management response.		31 December '18	Agreement with lenders on requirements for finalization of the document by end-October '18. Final Analysis of Cumulative Effects, in form and substance acceptable to the lenders by end-December '18.
6.6	The Company will (i) collaborate with EETC on the installation of bird flight deterrents on the 500 kV transmission line (TL); (ii) conduct fatality monitoring along sensitive sections of both the 220 kV and 500 kV TLs; and (iii) contribute to management actions that further the conservation of migratory soaring birds in the Gebel Al Zeit IBA.		Six months prior to the start of operations	Record of discussions and agreements reached with EETC six months prior to the construction of the TL. Develop a fatality monitoring protocol in form and substance acceptable to the lenders, 9 months prior to operations. Develop final Procedures, in form and substance acceptable to the lenders, 6 months prior to operations and integrate into Operations Phase BMP.
6.7	The Company will agree with Lenders on the scope of work for all ornithological studies and monitoring referred to in the PS/PR 6-related ESAP items.		Prior to first disbursement	Lender agreed scope of work for all ornithological studies and monitoring referred to in the PS 6/PR6 related ESAP items.