

BUTANTAN FOUNDATION PROJECT – BRAZIL
Environmental and Social Action Plan (ESAP)

No.	Aspect	Measure	Product/Result	Compliance Date
PS 1: Assessment and Management of Environmental and Social Risks and Impacts				
1.1	Meet national legislation requirements	1. Obtain environmental licenses for the project facilities.	1. Environmental licenses.	1. Before work begins
		1. Comply with all environmental licensing requirements.	1. Evidence of compliance with the environmental licensing requirements.	1. Before work begins and thereafter as part of the Environmental and Social Compliance Report (ESCR).
1.2	Environmental and Social Management System (ESMS)	1. Prepare an Environmental and Social Management System (ESMS).	1. Environmental and Social Management System.	1. Six months after construction begins.
		2. Conduct annual audits of the ESMS.	2. Annual audit reports.	2. In the ESCR.
1.3	Stakeholder Engagement	1. Report requests and complaints received by the SAC and Office of the Ombudsperson concerning the works at industrial facilities.	1. Report of requests and complaints from third parties.	1. In the ESCR
1.4	Emergency Preparedness and Response	1. Report emergencies, describing for each PAE activation instance: i) control measures implemented; ii) results; iii) emergency period; and iv) corrective action plans implemented to prevent recurrences.	1. Emergencies report.	1. In the ESCR
		2. Report training and drills in preparation to address emergencies.	2. Emergency training and drill reports.	2. In the ESCR
PS 2: Labor and Working Conditions				
2.1	Supply chain	1. Create contract provisions that require vendors to comply with the following: nondiscrimination; health and safety; environment; moral/sexual harassment prevention; and prevention of forced and child labor.	1. Copies of the contract clauses.	1. Three months after the first disbursement.
2.2	Grievance channel	1. Submit a report with a summary of worker requests and complaints presented to the "Talk to HR Channel" (Canal Fale com o RH).	1. Report on the Talk to HR Channel.	1. In the ESCR.
2.3	Accidents	1. Submit accident reports in project facilities during works and operations. Indicate the causes, severity, investigations performed, the treatment offered to victims, formal documentation and incident and accident rates with and without absences for the period.	1. Accident reports.	1. In the ESCR.
PS 3: Resource Efficiency and Pollution Prevention				
3.1	Greenhouse gases	1. Prepare a Greenhouse Gas Monitoring Plan.	1. Monitoring Plan for Greenhouse Gas Emissions.	1. Twelve months after the first disbursement.
		2. Implement the Greenhouse Gas Monitoring Plan.	2. Evidence of implementation.	2. In the ESCR.
		3. Submit an inventory of greenhouse gas emissions for Scopes 1 and 2.	3. Emissions report.	3. In the ESCR
3.2	Management of hazardous materials	1. Implement the Civil Construction Solid Waste Management Plan (PGRSCC) for project works.	1. PGRSCC implementation reports for project facilities.	1. During the construction phase, in the ESCR
		2. Implement the Solid Waste Management Program (PIGRIB) for project facilities.	2. PIGRIB reports for project facilities.	2. In the ESCR
		3. Submit the results of industrial effluent monitoring.	3. Monitoring reports.	3. In the ESCR.
PS 4: Community Health, Safety and Security				
4.1	Community health and safety	1. Conduct noise monitoring campaigns during project construction focusing on noise sensitive receptors.	1. Noise monitoring reports.	1. Semiannually, during the construction phase, in the ESCR.
		2. Upgrade the Air Emissions Monitoring Program (PMEA) adding monitoring of sensitive receptors with the parameters in CONAMA Resolution No. 491/2018.	2. Air emission monitoring reports.	3. In the ESCR.