

Environmental and Labor Issues:

This is a Category III project according to the IIC's environmental and labor review procedure because it could produce certain effects that may be avoided or mitigated by following generally recognized performance standards, guidelines, and design criteria. The main environmental and labor issues associated with the project involve the risk of river pollution due to oil spills or other hazardous substances, liquid effluent management, air emissions, solid waste management, personnel safety, and emergency response.

Maritime and riverine navigation is governed by implementing regulations issued under the River Transportation Agreement for the Paraguay-Paraná Waterway (between Puerto Cáceres and the port of Nueva Palmira), known as the Santa Cruz de la Sierra Agreement, approved by the Intergovernmental Waterway Committee (Comité Intergubernamental de la Hidrovía). The Uruguayan Coast Guard (Prefectura Nacional Naval - PNN) is tasked with implementing International Maritime Organization (IMO) conventions. Accordingly, Lirio Blanco will be required to meet environmental pollution standards under the International Convention for the Prevention of Pollution from Ships (MARPOL 73/78) and the navigation safety standards established by the International Convention for the Safety of Life at Sea (SOLAS).

In order to operate, Lirio Blanco must register its tugboats as Uruguayan-flag vessels with the PNN and the Merchant Marine Office (Dirección de Marina Mercante - DMM). This formality requires the fulfillment of certain obligations with respect to:

1. navigation security;
2. vessel seaworthiness/structural integrity; and
3. fitness for service of machinery and equipment.

Risk of river pollution from oil spills and other hazardous substances: Accidental or deliberate spills of oil or other harmful substances into waterways pose a risk of water and coastal pollution. Discharges of any such pollutants are strictly controlled by the aforementioned international and local regulations. For example, ballast water discharged into rivers must contain fewer than 15 parts per million of oil. Bilge water and any discharges containing oil residues are to be offloaded in ports equipped with licensed treatment facilities.

Lirio Blanco will develop a safety management system (SMS) in keeping with international recommendations under the International Safety Management (ISM) Code and domestic guidelines establishing instructions and procedures for ensuring the safe operation of ships and protecting the environment.

Liquid effluent management: Liquid effluents generated by ship crews categorized as sewage must be treated aboard prior to being discharged into rivers, or offloaded in ports equipped with licensed treatment facilities.

Air emissions: All engines, including tugboat propulsion engines and generators, are fueled by marine diesel oil. Lirio Blanco agrees to properly maintain the engines so as to ensure the most efficient combustion possible, thus reducing fuel consumption and air pollution.

Solid waste management: Solid waste from ships must be classified and offloaded by licensed operators and only in ports equipped specifically for this purpose. International standards require that all movements of wastes be recorded.

Personal safety and emergency response: The SMS will establish safety measures and procedures for shipboard jobs addressing areas such as navigation safety, the handling of fuel and flammable substances, contingency and emergency management procedures, and required personal protective gear and equipment for job performance.

The tugboats will need to be equipped with fire-fighting systems. Ship crews will undergo safety training covering topics such as fire-fighting, safe abandon ship procedures, evacuation and survival, first aid, cargo handling, and occupational accident prevention.

Labor practices: Lirio Blanco is in compliance with Uruguayan labor legislation. Mandatory core labor standards include legally-mandated benefits, freedom of association, organization of workers' unions, prohibition of forced labor and exploitative and abusive child labor, nondiscrimination in the workplace, health insurance coverage, and workers' compensation insurance. The company will not employ workers under the age of 18 years.

Monitoring and reporting: Lirio Blanco will be required to furnish the IIC with proof of current registration certificates for its entire fleet of vessels. The company will also draw up an Environmental and Social Action Plan (ESAP) to ensure compliance with IIC environmental and workplace safety and health requirements. Activities under the ESAP are to include implementation of the SMS. The company will present the IIC with annual progress reports on implementation of the ESAP.