

Environmental Classification: The project was appraised in March/April 2000. This is a category III project according to the IIC's environmental review procedure because specific impacts may result which can be avoided or mitigated by adhering to generally recognized performance standards, guidelines and design criteria. The principal environmental and labor issues related to this project include liquid effluent treatment, solid waste disposal, medical waste disposal, fire safety, safety during construction, and employee and student health and safety.

Issues: Environmental Compliance: The project is in compliance with national and local environmental, municipal, and fire regulations. Initiating construction and subsequent occupation and operations of facilities in the state of Santa Catarina is subject to approval from

- Fundação do Meio Ambiente (FATMA) for environmental issues;
- .Catarinense de Águas e Saneamento CASAN for water and sewerage issues;
- the Corpo de Bombeiros for fire safety issues;
- the respective municipal authority for land use and structural integrity; and
- various agencies of the Ministério do Trabalho such as CIPA (Comissão Interna de Prevenção de Acidentes) and SESMT (Serviço Especializado em Engenharia de Segurança e em Medicina do Trabalho) for safety training and accident compensation issues.

During the appraisal, the sponsor provided information on how it is addressing and plans to address environmental and labor issues and demonstrate that the proposed project will comply with applicable national, regional, and IIC requirements. The information provided about how these potential impacts are addressed by the project is summarized below.

Land Use: UNISUL operates 4 main campuses - together with 7 satellites - in Tubarão, Araranguá, Palhoça (the Pedra Branca campus), and Florianópolis. The campuses cover a total of 70 hectares of land and some 85,000 m² of buildings; of these 75,000 m² are owned by the University, providing some 380 classrooms and 100 laboratories. The three UNISUL campus sites included in the project are Tubarão, Içara, Pedra Branca, and Florianópolis. In Tubarão, Içara and Pedra Branca, the expansion of facilities will occur on the existing campuses. The Florianópolis expansion requires the purchase of two blocks of land for future campus expansion. One block of land, near the current Hospitality Campus, is 6,000 m², and will be purchased from HabitaSul (an urban developer). This site will be used for the project known as Jurerê-Escola Fundamental. The second block of land, 20 hectares in size, will be acquired for construction of future university buildings (known as Campus UNISUL Jurerê Internacional). Construction at this site would not be part of this project although UNISUL has agreed that the proposed buildings will meet IIC environmental, health, and safety standards. The current owner is a failed shrimp farm. The project sites are not located near sensitive habitats, and no resettlement nor economic displacement has occurred as a result of the project. None of the sites are prone to flooding.

Solid Waste Management: UNISUL's domestic solid waste will be collected by the municipal government. The waste generated by the laboratories in the health center (including medicine, dentistry, nursing etc.) as well as the waste from the clinical analysis laboratories, are collected by a private company (Formaco) for their disposal at a sanitary landfill managed by Formaco. The medical and dentistry schools will currently provide only the theoretical lectures and will perform testing on laboratory animals; the clinical training will be carried out at the local hospitals. UNISUL will implement a plan for the characterization and quantification of the solid waste generated at UNISUL and will also incorporate a recycling program.

Liquid Effluent Treatment: Liquid effluents including sewage are currently treated by septic tanks at the Pedra Branca campus; however, in approximately one year the municipal government will complete the construction of a wastewater facility for the area and the Pedra Branca will be connected to the system. The Tubarão and Içara campuses treat their effluents using a septic tank process but are constructing an on-site wastewater treatment plant. Liquid effluents from the Jurere Escola Fundamental at the Florianópolis campus will be treated at the municipal wastewater facility. UNISUL has agreed to test the performance of its septic systems.

Water Supply: Potable water for UNISUL will be supplied by CASAN (Cia. Catarinense de Águas e Saneamento), a state-owned water company. Electrical power for the project will be supplied by the national grid. UNISUL will not have backup generators for electrical power. UNISUL will not install air conditioning or cold storage equipment containing CFCs. UNISUL has made a commitment that no asbestos containing building materials will be used.

Occupational Health and Safety and Fire Safety: The project has been designed to incorporate a series of individual buildings. Each of these buildings has been designed to comply with the IIC and World Bank requirements for life and fire safety, in particular using the recommendations of the NFPA 101 code as a guide. IIC will rely on IFC's (International Finance Corporation) consultant fire engineering specialist, who has agreed to certify this compliance and will audit the construction to provide further certification that the finished construction has been completed in accordance with the design. UNISUL will provide occupational health and safety training programs for their employee's including personal protective equipment for specific areas, and fire safety.

Labor: UNISUL's staff faculty are members of are members of the respective municipal labor unions and campus staff associations. Through membership to these organizations faculty and staff participate in negotiating wages and benefits that are consistent with local requirements.

Monitoring and Compliance: During the life of the project, IIC will monitor ongoing compliance with its own Environmental and Labor Review Guidelines policy by evaluating monitoring reports submitted annually to IIC by the sponsor and by conducting periodic site reviews during project supervision.