

INTER-AMERICAN DEVELOPMENT BANK



HONDURAS

CORINSA – SELF-SUPPLY SOLAR (HO-L1099)

ENVIRONMENTAL AND SOCIAL MANAGEMENT REPORT (ESMR)

June 2014

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I. INTRODUCTION

Country:	Honduras
Sector:	Energy Efficiency and Renewable Energy
Name:	CORINSA – Self Supply Solar
Borrower:	Corporación Industrial del Norte S.A. (CORINSA)
Proposed A Loan:	US\$5 million
Environ. Class.:	Category C

II. PROJECT DESCRIPTION

- 2.1 The Corporación Industrial del Norte S.A. (CORINSA) aims to install a rooftop solar photovoltaic system to generate 3,078 KWp (3.1 MWp), approximately, for self-consumption, and improve the energy efficiency technology of their facilities (“The Project”). The Project includes the installation of 11,860 photovoltaic solar panels of 255Wp and 260Wp on an approximately 30,000 m² rooftop structure located at the CORINSA facilities.

Environmental and Social Settings

- 2.2 The Project will be located within an existing bottling plant in La Guardia neighborhood – San Pedro Sula city, Municipality of San Pedro Sula – Honduras. The CORINSA facilities are situated in a totally anthropized environment due to significant urbanization activities. The neighborhood encompasses a mix of residential, commercial and industrial infrastructure. See Figure 1 and 2. Therefore, the Project site cannot be described as a natural habitat since the site has already been impacted broadly by human settlements.



Figure 1



Figure 2

Project Schedule and Workforce

- 2.3 The Project is expected to have approximately 40 workers during the peak of the installation of the solar panels phase that is estimated to last four months; and, it is currently anticipated that 3 employees will be required during operations. The Project is expected to begin on August 7th, 2014 and start operating on November 24th, 2014.

III. COMPLIANCE STATUS AND PROJECT STANDARDS

Appraisal Process and Local Requirements

- 3.1 The *Ley de Promoción a la Generación de Energía Eléctrica con Recursos Renovables* (Law to Promote Generation of Electric Energy with Renewable Resources, in English), August 2013, requires on its Article 27 that projects generating three or less megawatts (3 MW) have to obtain an Operational License issued by the *Secretaría de Estado en los Despachos de Recursos Naturales y Ambientales* – SERNA – (Natural Resources and Environment Agency, in English). CORINSA already has delivered the formal request and documentation to the SERNA in order to obtain this license and be registered in Environmental Register. The Project has been submitted to the SERNA as Project Category I; these kinds of projects are those that have minimal environmental and social impacts and risks, and are design to improve social and economic welfare and environmental standards.
- 3.2 The Project has been classified as Category "C" as the potential negative environmental and social impacts and risks are likely to cause minimal or no negative environmental and associate social impacts and risks. This operation does not involve physical modification of the environment or generation of solid waste, effluents or gas emissions. The Project is

clearly design to produce positive environmental outcomes. The Project triggers the following directives of IDB's OP-703 Environmental and Safeguards Policy: B.1 Bank Policies; B.2, Country Laws and Regulations; B.3, Screening and Classification; B.7, Supervision and Compliance; and B.11, Pollution Prevention and Abatement. The OP-704 Natural and Unexpected Disasters Policy will also be triggered as the Project occurs in an earthquake and hurricane area.

3.3 Table 1, below, illustrates the Project's capacity to comply with IDB's various policies and directives.

Table 1: Compliance with IDB Policies and Directives

Policy / Directive	Applicable Aspect	Compliance Rationale
B.1 Bank Policies	Compliance with applicable IDB policies	The Project is currently in full compliance with all IDB policies and directives.
B.2 Country Laws and Regulations	Compliance with country laws and regulations	The Project is in compliance with all Honduran laws and regulations.
B.3 Screening and Classification	Application of appropriate classification	The Project has been screened using the Bank's toolkit and has been classified as a <u>Category C</u> operation.
B.4 Other Risk Factors	N/A	N/A
B.5 Environmental Assessment Requirements	Due to the nature of the Project, Category C, it is not required to develop an environmental assessment.	In accordance with the Honduran regulations, CORINSA has submitted all the documentation to obtain the Environmental Register to be issued by the SERNA.
B.6 Consultations	N/A	N/A
B.7 Supervision and Compliance	Monitoring of borrower's compliance with all Bank's environmental and social safeguard requirements	The Project will submit at least one compliance report during the installation and annual compliance reports during the operation phases.
B.8 Transboundary Impacts	N/A	N/A
B.9 Natural Habitats and Cultural Sites	N/A	N/A
B.10 Hazardous Materials	N/A	N/A
B.11 Pollution Prevention and Abatement	Pollution control and CO2 emissions	The Project will implement the adequate waste management program during the installation of solar panels phase. The project will reduce the country's CO2 emissions by providing a source of green energy.
B.12 Project Under Construction	N/A	N/A
B.13 Noninvestment and Flexible Lending	N/A	N/A

Policy / Directive	Applicable Aspect	Compliance Rationale
Instruments		
B.14 Multiple Phase and Repeat Loans	N/A	N/A
B.15 Co-financing Operations	N/A	N/A
B.16 In-country Systems	N/A	N/A
B.17 Procurement	N/A	N/A
OP-710 involuntary Resettlement	N/A	N/A
OP-765 Indigenous Peoples	N/A	N/A
OP-704 Disaster Risk Management	Earthquake and hurricane zone	The Project could be affected by earthquake and hurricane events. However, structural studies have been carried out to analyze the current roof structure.
OP-761 Gender Equality in Development	N/A	N/A
OP-102 Access to Information	Project information disclosure	IDB will make all relevant Project documentation available on its website.

Project Requirements and Standards

- 3.4 CORINSA has implemented an Environmental and Health and Safety Integral Management System (EHSIMS) which is based on the implementation of international standards. Currently, CORINSA has the ISO 9001:2008 (quality management systems) and ISO 22000:2005 (food safety management systems) certifications, and expecting to fully implement the ISO 14001:2004 (environmental management systems) and OHSAS 18001:2007 (occupational health and safety management system) on November 2014. The scope of the EHSIMS meets all the activities that generate environmental and health and safety impacts and risks in the facilities where the Project is located. Additionally, Project's technical study includes a specific section related to the health and safety requirements and regulations to be implemented by the contractors and subcontractors that will install the solar panels.

IV. KEY ENVIRONMENTAL AND SOCIAL IMPACTS AND RISKS

Environmental and Social Impacts and Risks

- 4.5 The potential negative environmental and social impacts and risk identified for the Project are minimal due to the nature of the activities that will be carried out during the installation and operational phases. During the installation of the solar panels, the main impacts and risks will be those related to the health and safety of the workers since they will be working on the

roof of the plant; generation of solid waste, mainly, due to the replacement of some roof structures; and temporary increment of traffic due to the transportation of the panels. In the case of the operational phase, no risks and impacts are predicted other than those related to health and safety issues during maintenance activities on the roof and generation of solid waste because of decommissioning of the Project. Since the Project is located in an area with plentiful rainfall year round, it is not expected to use water from resources other than those from natural rain to clean the solar panels.

Positive Impacts

- 4.6 The project will reduce greenhouse gas emissions by replacing grid electricity with electricity generated from emission-free solar power. In addition, the energy efficiency improvements will reduce demand on the electrical grid. Through reductions in electricity consumption the project is expected to generate approximately 100,000 tons of CO₂ emission reduction over 20 years. As one of the larger-scale rooftop solar projects in all of Latin America, this project also stands to provide demonstration effect for the Honduran and Latin American industry considering similar projects.

V. MANAGEMENT AND MONITORING OF ENVIRONMENTAL, SOCIAL, HEALTH AND SAFETY AND LABOR IMPACTS AND RISKS

- 5.1 The technical study of the Project includes a Health and Safety Study (HSS), which contains the regulations and procedures in order to prevent any negative impact or risk on the workers during the installation of the solar panels. This HSS applies to all contractors and subcontractors that will be involved in the installation activities. In addition, the Project will follow all the procedures and plans that are part of the (EHSIMS) that aims to prevent any environmental and social impact or risk. Specifically, the EHSIMS includes a plan to identify and assess the environmental aspects during any new development or implementation the activities in the Project site; after the identification of any environmental and social aspects, the plan will be reviewed and updated to prevent any impact or risk. Finally, to mitigate and manage any event related to disaster risks, the EHSIMS manual includes a Procedure to Identify and Assess Risks.

Monitoring and Supervision

- 5.2 Implementation of the environmental and social safeguards for the Project will be monitored and supervised through an Environmental, Social and Health and Safety Compliance Report (ESHSCR). It is expected that at least one ESHSCR will be delivered to the Bank during the installation phase and one ESHSCR annually for the operation phase.

VI. REQUIREMENTS TO BE INCLUDED IN THE LEGAL AGREEMENTS

- 6.1 The conditions described below are required to be fulfilled for the Project throughout the life of the loan, in form and substance satisfactory to IDB. The IDB will require within its Loan Agreement that the Project and each Project party (Sponsor/Borrower/Company) and other Project/Environmental parties, including construction companies and operators, and any contractors and sub-contractors will, at all times during the life of the Loan Agreement, comply with the following requirements:



- a. All applicable environmental, social, health and safety, and labor regulatory requirements of Honduras
- b. All requirements associated with any environmental, social, health and safety, and labor related permits, authorizations, or licenses that apply to the Project, the Borrower or any party responsible for executing the Project or its mitigation measures
- c. All environmental, social, health and safety, and labor requirements of the Project contracts and any subsequent modifications
- d. All aspects and components of all of the Project's environmental, health and safety, social and labor documents
- e. All relevant IDB policies such as the Environment and Safeguards Compliance Policy (OP-703), the Disaster Risk Management Policy (OP-704) and the Disclosure of Information Policy (OP-102), the Involuntary Resettlement policy (OP-710), the Operational Policy on Indigenous Peoples (OP-765) and the Gender and Equity in Development Policy (OP-270) and their respective guidelines.

