

**COMBINED PROJECT INFORMATION DOCUMENTS / INTEGRATED
SAFEGUARDS DATA SHEET (PID/ISDS)**

Appraisal Stage

Report No.: 106444

Date Prepared/Updated: 01-June-2016

I. BASIC INFORMATION

A. Basic Project Data

Country:	Ecuador	Project ID:	P157324
		Parent Project ID :	
Project Name:	Ecuador Risk Mitigation and Emergency Recovery Project (P157324)		
Region:	LATIN AMERICA AND CARIBBEAN		
Appraisal Date:	17-Dec-2015	Board Date:	15-Mar-2016
Practice Area (Lead):	Social, Urban, Rural and Resilience Global Practice	Lending Instrument:	Investment Project Financing
Sector(s):	General agriculture, fishing and forestry sector (20%), Health (10%), General transportation sector (40%), Flood protection (30%)		
Theme(s):	Natural disaster management (100%)		
Borrower(s)	Ministry of Finance		
Implementing Agency	Ministry of Finance		
Financing (in USD Million)			
	Financing Source	Amount	
	Borrower	18.00	
	International Bank for Reconstruction and Development	150.00	
	Financing Gap	0.00	
	Total Project Cost	168.00	
Environmental Category	B-Partial Assessment		
Decision			
Other Decision (as needed)			
Is this project processed under OP 8.50 (Emergency Recovery) or OP 8.00 (Rapid Response to Crises and Emergencies)?	Yes		
Is this a Repeater project?	No		

B. Introduction and Context

Country Context

Ecuador is a middle-income country with an economy dependent on its natural resources. Oil represented over half of total exports in 2014, followed by food and agricultural goods with approximately one-fourth of exports. Over the past decade, Ecuador experienced growth in the context of a favorable external environment that together with foreign savings financed a large expansion of the public sector. Over that same period of high oil prices, Ecuador made significant gains in reducing poverty and promoting shared prosperity. Poverty rates fell from 38.3 to 25.8 percent between 2006 and 2014, and the income of the bottom 40 percent of the population saw annualized growth rates of nearly 7 percent compared with only 4 percent nationwide.¹ These advances have placed Ecuador among the top performers in Latin America and the Caribbean in terms of reducing poverty and improving shared prosperity. These gains, however, are coming under stress. The drop in oil prices in 2014, coupled with the strengthening of the U.S. dollar are raising concerns on whether these social advances can be sustained in the coming years. The macroeconomic effects of the new global context have widened Ecuador's fiscal and external imbalances. With limited buffers to draw upon, the Government of Ecuador (GoE) has taken measures since 2014 to partially offset the impact of lower oil prices on the economy, involving budget cuts and restrictions on imports, including temporary tariff surcharges. The GoE has also taken some steps to promote private investment and job creation, which nonetheless remain depressed.

The Ecuadorian landscape is dominated by the Andes Mountains, fertile river valleys, and a large number of volcanoes. Two tectonic plates, the Nazca Plate and the South American Plate, also converge in Ecuador. These geological and hydro-meteorological dynamics make Ecuador susceptible to several types of natural and geological occurrences including earthquakes, volcanic eruptions, tropical storms, floods and landslides.² Flooding mainly affects the coastal zone, while volcanic eruptions affect the central zone. Drought has been recorded in the northern coastal and central regions, and frequent landslides affect urban areas and infrastructure.³ Climate extremes are already the most common type of disasters in Ecuador, adversely affecting the population and the economy of the country. While climate change is expected to increase the frequency and intensity of extreme climate events in many regions of the world, Ecuador becomes even more vulnerable to climate change.

Situations of Urgent Need of Assistance or Capacity Constraints

As of November 2015, Ecuador is facing two imminent natural hazards which could cause major damages and losses (estimated at US\$6 billion⁴) at any time during the next 24 months, and have an important negative impacts on the economic and social development of the country: (i) a potential eruption of the Cotopaxi volcano, and (ii) potential adverse effects from the 2015-16 El Niño phenomenon.

¹ These are consumption based poverty rates computed using the *Encuesta de Calidad de Vida* (ECV). The income based poverty and extreme poverty rates, computed with the Encuesta Nacional de Empleo, Desempleo y Subempleo Urbano y Rural for December 2015 were 23.3 percent and 8.45 percent, respectively.

² United Nations Office for Disaster Risk Reduction (UNISDR). Ecuador Country Profile.

³ Global Facility for Disaster Reduction and Recovery (GFDRR). Ecuador Country Program Update. May 2014. World Bank.

⁴ Data from the National Secretariat of Disaster Risk Management or *Secretaria Nacional de Gestión de Riesgos* (SGR)

Cotopaxi Volcano. On August 14, 2015, the Cotopaxi volcano, about 50km south of Quito and 33km northeast of Latacunga, began erupting after being dormant for 138 years. The 5,897m high volcano released high columns of ash (up to 2km above the crater) which affected Latacunga town and put surrounding densely populated areas at risk (e.g. Quito southern neighborhoods). Since then, the volcano has shown irregular activity and has been very closely monitored, so that an evacuation alert could be immediately given to the populations if necessary. According to the national risk mapping and the analysis from the National Secretariat of Disaster Risk Management (SGR), an estimated 400,000 people (including at least 145,000 in the very high risk areas) and some key infrastructure (including 7 health centers, 133 schools, 41km of roads, 39.5km of electrical infrastructure) would be affected if an eruption triggers explosions, volcanic gases, mudslides, lava flows, lahar and debris avalanches. Potential damages and losses are estimated at US\$1.37 billion. Under a moderate eruption scenario⁵, there is a high probability of lahar, and debris avalanches would damage at least 50 percent of schools, hospitals and prisons in the towns of Latacunga and San Felipe. Data from the National Institute of Geophysics (IG-EPN) confirm that a VEI2-3⁶ level of eruption (the most likely scenario at present) could generate up to 8km-high columns of ash and 30 million m³ of lahar. The level of alert since August 2015 is Yellow, meaning the volcano is exhibiting signs of elevated unrest above known background level, and could be elevated to Orange or Red at any time⁷. The GoE has been working to ensure that all technical and operational entities are alert and ready in case of an emergency, in particular through its Technical Working Groups (TWGs)⁸.

El Niño Phenomenon. In Ecuador, the El Niño phenomenon is characterized by a decrease in the intensity of trade winds, high sea surface temperatures along the coast increasing evaporation and cloud formation, and an intertropical equatorial convergence zone. These factors create favorable conditions for heavy rainfall. During an El Niño episode, the coast experiences hot and humid air from the northeast which accentuates precipitation levels. The normal process of cloud displacement to the mountainous area of the Andes is more pronounced, producing unusual rain along the coast. At a global scale, the US NOAA (National Oceanic and Atmospheric Administration) is forecasting what could become the strongest El Niño on record. The analysis conducted by the Ecuadorian National Institute of Meteorology and Hydrology (INAMHI) based on data from NOAA, indicates that the phenomenon has already started in Ecuador (as of November 2015) and that the conditions are likely to intensify in the coming months, possibly reaching similar impact levels as the past episodes of 1982-83 (strong event) or of 1986-87 (moderate event). In both cases, the phenomenon is expected to generate higher precipitation levels (than during non-El Niño years) from November 2015 to March 2016 at least. Heavy rains would affect most of the country, the littoral zone in particular, causing flooding and landslides. During the 1982-83 El Niño episode, the GoE recorded 700,000 people affected, 307 deaths, and estimated economic losses at US\$1.43 billion (2015 US\$). During the 1997-98 El Niño episode, increase in sea level reached up to 42cm in some areas, causing significant coastal flooding as well as pluvial flooding, and subsequent drainage challenges: discharges in most coastal rivers were recorded to reach return periods of 100 years. The GoE recorded 13,374 families affected,

⁵ Williams, R. (2006) *Modeling Lahars Using Titan2d For The Southern Drainage Of Volcán Cotopaxi: Impact On The City Of Latacunga* By Rebecca Williams Master of Science Department of Geology. United States of the America: Buffalo University.

⁶ Volcanic Explosivity Index (VEI) 2-3 level is associated with eruptions of moderate magnitude, likely to produce some damages and health problems associated to respiratory illness due to the ashes. Such eruptions for the Cotopaxi volcano occurred in 1854.

⁷ Volcanic Activity Alert Notification System from the US Geological Survey. See *Annex 2* for more details.

⁸ Locally known as *Mesas Técnicas de Trabajo*: mechanism created by the GoE to convene and coordinate the technical competences from the public and private sectors to address risk reduction and emergency response (exists at the local and national level).

293 deaths, 30,000 subsequent homeless people, and data from the Latin American Development Bank (CAF) reveal that the event resulted in US\$4.13 billion in damages and losses (2015 US\$). For this El Niño, the GoE is estimating potential damages and losses at US\$4.43 billion, with potentially 297,765 people, 1,303 health centers and 2,900 schools affected.

Seismic events: A number of earthquakes has severely impacted the economy with the subsequent consequences in the society as a whole: an earthquake in Esmeraldas on January 31, 1906 with the magnitude 8.8; Ambato in 1949 (M = 6.8); Reventador in 1987 (M = 6.1 and 6.9); and Bahía de Caraquez in 1998 (M = 7.2). The latest major earthquake took place on April 16, 2016 (M = 7.8) with the epicenter located close to Pedernales (Manabí) within 20 km of depth. This earthquake and the aftershocks – including two major ones on May 18 of magnitude 6.7 and 6.8 – caused significant damages and losses that are being assessed in detail with results expected for June 2016.

To address the emergency caused by the seismic event to protect the physical integrity of citizens and perform actions required to address the effects, the President declared State of Emergency in the provinces of Esmeraldas, Manabí, Santa Elena, Santo Domingo de los Tsáchilas, Los Ríos and Guayas, through an Executive Decree on April 17, 2016. Likewise, the National Secretariat of Disaster Risk Management (SGR), through Resolution SGR-048-2016 of April 17, 2016, declared a red alert (notice that emergency or disaster is occurring).

Sectoral and Institutional Context

Emergency Management and Risk Reduction. In 2008, Ecuador transitioned from a vision of risk management focused on emergency management to a vision integrating risk management in the territorial and sectorial development. In 2010, the code for “territorial planning” was created, ensuring the inclusion of risk management into land use plans. The *Banco del Estado* (BEDE) was created to attend the Autonomous Decentralized Governments (GAD) and fund, amongst others, prevention works. The SGR was created to lead the National Decentralized Risk Management System (NDRMS). The six objectives of the SGR are to: (i) promote the reduction of vulnerability; (ii) ensure that private and public institutions include risk management in their planning; (iii) encourage the use of science and research in risk management; (iv) develop capacities for preparedness, prevention, mitigation and risk reduction; (v) organize the humanitarian response and (vi) ensure that the reconstruction processes reduce vulnerability.

Hydrometeorological and Oceanic Risk Knowledge and Monitoring. The institutions that contribute to hazard knowledge at the national level are the INAMHI, the *Instituto Nacional de Pesca* (INP) and INOCAR (for oceanographic information). At the international level, Ecuador actively participates in the regional efforts to produce information on El Niño. Since 1974, Ecuador has been part of the *Estudio del Fenómeno Regional de El Niño* (ERFEN). Additionally, the International Research Center for El Niño (CIFFEN) which was created in 2002, has its headquarters located in Ecuador. The main objective of Ecuador’s participation is to promote and develop actions to consolidate science-policy interaction and the strengthening of climate and ocean services aiming to contribute to risk management and adaptation to climate change and climate variability. The correlation between the El Niño and climate variability is being studied especially through the readings over NINO3.4 (the specific Niño region defined and studied by NOAA) capturing both the important sea surface temperature variability and the changes of strong precipitation. Those inform most predictions about how the El Niño events may affect global climate variability and shifting rainfall patterns (IRI 2015b).

Agriculture/Livestock. Ecuador has 1.1 million agricultural households, regarded as small and medium producers, who own about 1.6 million hectares (25 percent of the area of the country). Over

the past decade, livestock production has contributed to the Agricultural GDP by 37 percent, equivalent to approximately 3 percent of total GDP. In the last thirteen years, production of milk has contributed to 1.4 percent of total GDP, and meat to 1.3 percent. These sub-sectors are expected to grow due to the potential for generating products and by-products with high added-value and the increasing global demand for these products.

Transport. The Ecuadorian road network has a total of 5,609 km of main roads, subject to multiple hazard risks. About 52 percent of the main road network is located in landslide-prone areas. Moreover, 66 percent are located in areas where seismic intensities have been registered where the physical integrity and functionality of the road system and related infrastructure (bridges and retaining walls) are at risk. Approximately 476 km (8.5 percent of the total) of main roads are on areas with volcanic hazard - an area of 913.57 km² has a high probability of being affected by mud and lahars from a Cotopaxi eruption (including bridges connecting Quito). Besides the geophysical risk, roads are also highly vulnerable to hydro-meteorological hazards: 46 percent of main roads are in flood prone areas with 450 km on areas with high flood hazards⁹.

Water Infrastructure and Flood Protection. Water resources in Ecuador are abundant but unequally distributed, and key drivers of economic development such as the agriculture and hydropower sectors are water-intensive sectors (irrigation represents 80 percent of consumptive water uses). Hence, adequate regulation and management, and safeguarding the ecological integrity of upstream watersheds are critical to sustain environmental flows and ensure water availability for the different uses in the country, including water for human consumption. Climate change is also likely to impact water (and energy) production. Changes in rainfall patterns and the occurrence of extreme weather events are likely to increase water stress and affect the water balance, therefore affecting negatively the availability of water for investments in water supply and sanitation, as well as hydropower. Both, the Ministry of Agriculture, Livestock, Aquaculture and Fisheries (MAGAP) and the Public Water Company (EPA) intervene in water resources management, at different levels and on different scales. EPA focuses on hydraulic infrastructure mostly dedicated to flood prevention and protection (and is not a regulatory body). EPA in case of an emergency would also assist the local governments to restore water supply and sanitation services. Although there has been great progress over the last decade in providing access to water and improved sanitation services in Ecuador, the level and quality of service provided remain low in comparison with the regional average. In 2010, the share of Ecuadorian households connected to a public drinking water distribution network was 72 percent in urban areas and 27 percent in rural areas, while the average in the Latin American and Caribbean region was 94 percent and 62 percent, respectively¹⁰.

Health. Ecuador is a country where malaria, dengue, cholera, rabies and other tropical diseases are endemic. These diseases are exacerbated by poverty, lack of access to basic water and sanitation services, housing and hygiene, as well as the effects of climate change. There is evidence in Ecuador showing the correlation between changes in weather conditions caused by El Niño and changes in occurrence of infectious diseases, especially for those caused by vectors (e.g. malaria) and those which are waterborne (e.g. cholera). The 1997-98 El Niño brought dire health consequences – on the one hand those directly related to climate events that influence health (direct rainfall, increased river flow, mudslides and landslides) and on the other hand those originating from the induced effects of these physical impacts (collapse of drainage or sewage systems, untreated water systems, overcrowded housing, accumulation of garbage, inadequacy of waste disposal systems, increased vector populations

⁹ Ministry of Transport and Public Works (MTOPE), 2013

¹⁰ NEC, *Instituto Nacional de Estadísticas y Censos*; 2010 census data.

due to flooding and problems with accessibility and service delivery).

C. Proposed Development Objective(s)

Development Objective(s) (From PAD)

The Project Development Objective is to reduce the potential effects of the El Niño phenomenon and the Cotopaxi volcano, and support the recovery of basic and production services in affected areas in case of an Eligible Disaster, in selected sectors.

An Eligible Disaster refers to any natural disaster, national or localized in scope, that poses or is likely to imminently pose a threat to life, assets and/or productive capacity of the GoE, which can be originated by: (i) geological hazards, i.e. extreme natural events originated in the crust of the earth, such as earthquakes, volcanic eruptions, tsunamis or tidal waves, landslides (as a secondary event after an earthquake for example), etc.; (ii) hydro-meteorological hazards, i.e. natural events produced by the climate variability as heavy rains, flooding, landslides, etc.; (iii) intensified El Niño phenomenon causing heavy rains, floods, storm surge or landslides.

Key Results

The results of the proposed Project will be measured through the following set of indicators:

- Direct Project beneficiaries (directly deriving benefits from an intervention financed by the Project) disaggregated by gender;
- Number of people protected through flood mitigation and/or emergency maintenance and/or stabilization works;
- Capacity of shelters supported by the Project to protect and house productive animals;
- Number of people attended by the equipment and/or services provided by the health sector supported by the Project;
- Number of people benefiting from rehabilitated infrastructure and/or restored productive services after an Eligible Disaster occurs.

D. Project Description

The present ISDS is an updated Appraisal Stage ISDS that reflects completion of safeguard instruments preparation that was deferred to post-Appraisal based on Paragraph 12 of the World Bank's Operational Policy 10.00 (see further under section IV 4).

Preparatory activities under Component 1 are guided by the Alert Declarations in effect related to the Cotopaxi volcano and the El Niño phenomenon, and the emergency preparedness action plan prepared by the GoE. Component 2 is designed to respond to any natural disaster meeting certain trigger criteria, described in the Project's Operations Manual (POM). The main trigger is the SGR's issuance of an Orange Alert Declaration for the El Niño phenomenon, or Red for the Cotopaxi volcano or any other Eligible Disaster. While the official Declarations may be in effect for a defined period of months, implementation of Component 2 once triggered, may occur over a period of years.

A. Project Components

Component 1: Disaster Preparedness and Risk Mitigation (US\$49.06 million total; US\$43.8 million IBRD)

This Component aims to reduce the potential impacts of the hazards expected from El Niño and Cotopaxi volcano, according to the emergency preparedness action plan prepared by the GoE (jointly by the SGR, MICS and the MF). This plan is a selection of emergency activities that include, inter alia: river dredging, clearing of waterways, road rehabilitation, preventative stabilization works, building of livestock shelters, and procurement of medicines, supplies and components necessary to protect public health. Some activities require immediate action and are being prioritized because of the imminent risk of flooding due to El Niño (which is already happening in certain regions) or of an imminent volcanic eruption. The associated investments could be therefore be supported by retroactive financing. The use of the retroactive financing modality is critical to the GoE because the period of expected heavy rainfall caused by El Niño commenced at the end of December 2015. The GoE aims to mitigate the risk of flooding and infrastructure damage to protect the population and assets and avoid cost overruns in case works are interrupted due to the increased severity of the weather conditions. This Component is divided into four subcomponents corresponding to activities implemented by the co-executing agencies under the coordination of the MF: EPA, MAGAP, MTOP and MSP. It will provide support for disaster preparedness and mitigation measures in the following sectors:

Water and Flood Protection Sector, under EPA - Subcomponent 1.1 (US\$11.2 million total; US\$10.0 million IBRD): through the carrying out of activities aimed at mitigating the risk of flooding by ensuring river beds are cleared of sediments and riverbanks are protected, including: (i) mechanical dredging activities in select rivers and waterways, and (ii) the rehabilitation or construction of retaining and protection walls and flood control infrastructure along select rivers.

Agriculture, Livestock, Aquaculture and Fisheries Sector, under MAGAP - Subcomponent 1.2 (US\$2.24 million total; US\$2.0 million IBRD): through the carrying out of activities aimed at mitigating the risk of: (i) flooding by ensuring the drainage systems can accommodate excess rainfall through cleaning and desilting of select drainage channels in public irrigation and drainage systems in critical areas; and (ii) loss of dairy production by ensuring the cattle at highest risk around the Cotopaxi are evacuated and provided basic care through the construction and equipment of temporary shelters for animals.

Transport Sector, under MTOP - Subcomponent 1.3 (US\$24.42 million total; US\$21.8 million IBRD): through the carrying out of activities aimed at mitigating the risk of damage to the road network in critical areas by reducing its vulnerability and improving its climate resilience against the potential El Niño effects and its robustness against the potential effects from the Cotopaxi volcano, including: (i) protection and stabilization works on select sections of the country's road network, (ii) emergency maintenance works on select sections of the country's road network and select bridges, (iii) emergency maintenance works on machinery and equipment, and (iv) the acquisition and held of Bailey bridge components, as well as the provision of services for the overhaul of the Bailey bridges.

Health Sector, under MSP - Subcomponent 1.4 (US\$11.2 million total; US\$10.0 million IBRD): through the carrying out of activities aimed at improving MSP's capacity to respond to the effects of El Niño and/or Cotopaxi eruption, in particular the occurrence of diseases, and to prepare in general for an emergency by providing resources and training to the sector, through: (i) the purchase of protective equipment, reagents, drugs, and other medical supplies, (ii) the provision of training to health centers, (iii) the purchase of ambulatory health modules.

All the activities will be implemented through the carrying out of works and the provision of goods, consultants' services, non-consulting services and training. Climate change co-benefits are expected to be brought through all the IBRD investments under Component 1 except for the Cotopaxi animal shelters (US\$41.8 million).

Component 2: Post-Disaster Recovery and Reconstruction (US\$117.6 million total; US\$105.0 million IBRD)

This Component aims at providing support for the recovery and reconstruction of selected sectors (such as the transport, water and agriculture sectors), should an Eligible Disaster occur. The Component will follow a framework approach based on a list of eligible activities that contribute to the rehabilitation or re-construction of select transport/road, water/sanitation/flood protection infrastructure, crop and livestock production or any other sector agreed between the GoE and the World Bank (WB) as described in the POM.

Expected damages from a volcano eruption or heavy rainfall or other extreme climate event or other natural disaster such as an earthquake, would affect the transport, water and agriculture sectors (further potential sectoral damages are outlined in *Annex 2*). Climate change co-benefits would be brought through activities related to addressing El Niño and all hydrometeorological hazards. They cannot be accurately evaluated at the time of Project preparation and before an Eligible Disaster occurs, but can be estimated to be carried by 70 percent of Component 2 IBRD investments (US\$73.5 million).

The criteria for activity selection under the Component will include: (i) being within the geographical area impacted by the disaster noted in the Alert Declaration issued by the SGR; (ii) being classified as a Category B or C sub-project, (iii) not being an activity that would affect international waterways, (iv) to the extent possible focusing interventions on specific geographic areas to maximize the impacts of the investments; (v) recovering vital infrastructure to restore critical basic and productive services; (vi) ensuring access and connectivity; (vii) prioritizing sub-projects that have an advanced level of preparedness and can ensure rapid response and recovery.

Component 3: Project Implementation, Monitoring and Evaluation (US\$1.34 million total; US\$1.2 million IBRD)

This Component will provide support to the MF, EPA, MTOP, MSP, and MAGAP and other selected sectors, for the administrative management of the Project, including: (i) the hiring of a Project Coordinator, specialists in financial management, procurement, and monitoring and evaluation for the PCU; (ii) the hiring of other technical temporary staff (including, but not limited to, environmental and social specialists) needed during Project implementation; (iii) the carrying out of Project audits; and (iv) the financing of the necessary goods and equipment.

E. Project location and Salient physical characteristics relevant to the safeguard analysis (if known)

The potential Project intervention area covers the whole of the country, depending on the actual scope of the eligible natural disaster(s) that Component 2 will address. Respect to Component 1, the Project was initially planned to cover 20 of the 25 provinces: the provinces of Cotopaxi, Napo and Tungurahua related with a potential eruption of the snow-covered Cotopaxi Volcano, located about 50km south of Quito and 33km northeast of Latacunga, the capital of the Cotopaxi province.

Regarding the El Niño phenomenon, the Project was designed to cover 17 provinces, excluding Napo, Tungurahua, Sucumbíos, Orellana, Pastaza, Morona Santiago y Zamora Chinchipe. According to the related risk mapping, at least an estimated 400,000 people and some key infrastructure could be affected if a potential eruption triggers explosions, mudslides, avalanches or other eruption-related incidents. Data from the Institute of Geophysics of Quito, which has been monitoring the Volcano for decades with high technology, show that a VEI2-3 level of eruption could generate ash columns up to 15km high and up to 60 million m³ of lahars.

Regarding El Niño effects, the strongest impacts have been expected in the most humid zones in the coast, where the pluviometric levels are linked to the surface temperature indices of the sea. The highest precipitation anomalies occur in areas close to the cordillera, where under normal condition precipitation is also high. The Guayas flood plain seems to be the area where the impact is strongest, causing flooding and landslides. This area concentrates 40% of the population of the country. Medium; noticeable but weak impacts are expected in the north of the coast and the western flank of the cordillera. Lastly, insignificant impacts are expected in the interandean valleys and the Amazons basin.

Ecuador has different types of forests from dry to moist forest ecosystems. In both the Cotopaxi Volcano and El Niño impacted areas, there is a number of different categories of protected areas, and people live in the buffer zones of the same. In terms of social composition, there is presence of indigenous peoples, particularly in the cantons of Mejía, Ruminahui, Latacunga, Salcedo, and Saquisilí that, based on thematic disaster diagnostic studies carried out by the GoE, are the most affected by a potential eruption of the Cotopaxi Volcano.

Regarding the emergency caused by the earthquake on April 16, 2016, the coastal provinces of Esmeraldas, Manabí, Santa Elena, Santo Domingo de los Tsáchilas, Los Rios and Guayas suffered the worst impacts.

F. Environmental and Social Safeguards Specialists on the Team

Felipe Jacome (GSU04)

Martin Henry Lenihan (GSU04)

Tuuli Johanna Bernardini (GEN04)

II. IMPLEMENTATION

Due to their convening and coordinating power, as well as their decision-making power in terms of financial allocation throughout the sectors, MF was selected to be responsible for overseeing Project implementation. On that purpose, a Project Coordination Unit (PCU) was established directly under the Office of the Minister of Finance, including the necessary technical, administrative, financial and procurement staff for the Project's effective implementation. The PCU is operational and fully staffed since the end of April 2016. The PCU team at MF has overall responsibility, ensuring compliance with fiduciary agreements, procurement guidelines, social and environmental management and monitoring, reporting and evaluation of processes and results. Although MF has never implemented directly a WB-financed project, responsible staff is familiar with WB policies and procedures and have been closely following all types of engagement processes as part the WB program assistance to Ecuador.

The Project was designed for MF to have four co-executing agencies – MSP, MAGAP, MTOP and EPA – to actively participate in Project implementation, and potentially more during implementation as

needed and under certain entry conditions. The reason why other selected sectors can participate as a co-executing agency during project implementation is that the type and magnitude of impacts is unknown especially under Component 2 that was designed as a Contingent component to respond in a timely and strategic manner to an Eligible Disaster. For instance, after the earthquake of April 16, 2016, the GoE is reviewing the priorities and needs, and best use of the different sources of financing they have access to, to decide on the recovery and reconstruction investments. As a result, some of the activities that were initially planned are put on hold (such as the construction of animal shelters under Component 1), at least momentarily. In any case, every selected co-executing agency will use their fiduciary and social and environmental personal to execute all the activities according to the procedures established in the project's Operational Manual, including the ESSAF. Said personal will also validate the quality of works and the invoices before sending the information to MF. MF will sign subsidiary agreements with each of its co-executing agencies to guarantee coordination and collaboration. These agreements specify the roles and responsibilities of these agencies under the Project, specifically related to fiduciary and social and environmental management, execution and supervision of civil works and procurement of goods and services.

MF will be the only channel of communication with the WB. Frequent trainings on procurement, financial management, safeguards, and other topics will be provided to all entities during Project implementation as needed. Annex 3 of the Project Appraisal Document (PAD) provides a detailed description of the initially planned implementation arrangements.

III. SAFEGUARD POLICIES THAT MIGHT APPLY

Safeguard Policies	Triggered?	Explanation (Optional)
Environmental Assessment OP/BP 4.01	Yes	Potential social and environmental impacts are related to the disaster preparation and risk mitigation, as well as to post-disaster recovery and reconstruction investments. The GoE has prepared, consulted and disclosed an Environmental and Social Screening and Assessment Framework (ESSAF) to guide the Project's social and environmental management. See further details under Summary of Key Safeguard Issues.
Natural Habitats OP/BP 4.04	Yes	Given the rich biodiversity and the number of different types of protected areas in Ecuador, the Project applies a precautionary principle to trigger OP/BP 4.04 particularly as the actual scale and location of the potential natural disaster impacts and the related response investments are still unknown. The ESSAF includes guidance to screen for potential natural habitats impacts and address them appropriately.
Forests OP/BP 4.36	Yes	Given the forest coverage of the potential intervention area, the Project applies a precautionary principle to trigger OP/BP 4.36 particularly as the actual scale and location of

		the potential natural disaster impacts and the related response investments are still unknown. The ESSAF includes guidance to screen for potential forest related impacts and address them appropriately. No reforestation activities to prevent landslides or other type of disasters are projected.
Pest Management OP 4.09	Yes	Component 1 will finance personal protection equipment for safe handling of chemical larvicides to control mosquitoes as vectors for several diseases that are expected to spread due to the El Niño effects that might cause increased use of chemicals. The assessment of MSP's capacity and adequacy of the system for managing chemicals was conducted before Project effectiveness. Annex 13 of the ESSAF, Emergency Plan for Vector Control, includes a detailed description of the related socio-environmental management by MSP.
Physical Cultural Resources OP/BP 4.11	Yes	Given the rich physical cultural resources (PCR) of Ecuador, the Project applies a precautionary principle to trigger OP/BP 4.11 particularly as the actual scale and location of the potential natural disaster impacts and the related response investments are still unknown. Chance finds of cultural artefacts may neither be ruled out during Project implementation. The ESSAF specifies appropriate requirements for screening of investments, and sub-project Environmental Management Plans (EMPs) will include appropriate management measures in case any known cultural resources might result affected by any sub-project.
Indigenous Peoples OP/BP 4.10	Yes	This policy is triggered due to the presence of indigenous peoples within the Project area. The majority of the disaster mitigation activities initially planned under Component 1 focus on existing infrastructure works that are not expected to have effects on indigenous populations. A screening of the zone of influence of the shelters for cattle to be constructed under Component 1 revealed that close to 90% of the population were Mestizo, while the indigenous populations were scattered throughout the zone and not concentrated in communities; the indigenous population in this Project area do not meet the characteristics set out in OP 4.10. This was

		<p>confirmed by the local social scientist advising the GoE and the WB task team.</p> <p>Particularly for the contingent component (Component 2) but applicable to the whole Project, the Project counts with an Indigenous Peoples Planning Framework (IPPF) as Annex 9 of the ESSAF. The IPPF includes specific guidance on how to effectively engage indigenous communities as well as procedures to be used for screening all activities to be financed under the Project, ensuring that they maximize social benefits and avoid or mitigate adverse impacts on indigenous peoples.</p>
Involuntary Resettlement OP/BP 4.12	Yes	<p>Project activities may result in limited temporary or permanent involuntary resettlement or land acquisition. Investments initially identified under Component 1, including maintenance of existing infrastructure such as roads, canals, and irrigation systems, dredging of rivers, and construction of cattle shelters in public land were screened and found to trigger minimal disruption and not to require land acquisition. The Project counts with a Resettlement Policy Framework (RPF) as Annex 10 of the ESSAF to ensure full application of the appropriate safeguard policies. The Project funds will not be used to any resettlement related compensation cost.</p>
Safety of Dams OP/BP 4.37	Yes	<p>Project will not finance construction of major dams. However, as there are major dams in the area susceptible to El Niño effects, the Project applies a precautionary principle to trigger OP/BP 4.37, in case EPA, the responsible GoE agency, would need to incur to any dam related rehabilitation works with Project financing under Component 2 on Post-Disaster Recovery and Reconstruction. The ESSAF describes the basic OP/BP 4.37 requirements that any work on rehabilitating a major dam will need to satisfy under a WB financed project. Overall, the Project will comply with the related procedures as applicable to any activity related with a major dam that the Project might end up financing.</p>
Projects on International Waterways OP/BP 7.50	No	<p>Project activities will not be conducted in or influence international waterways. It was agreed with the GoE that any activity that</p>

		would need to trigger this Policy would be excluded from Project financing.
Projects in Disputed Areas OP/BP 7.60	No	Project activities will not be conducted in disputed areas.

IV. Key Safeguard Policy Issues and Their Management

A. Summary of Key Safeguard Issues

1. Describe any safeguard issues and impacts associated with the proposed project. Identify and describe any potential large scale, significant and/or irreversible impacts:

The Project triggers OP/BP 4.01 on Environmental Assessment. It is classified as an "Environmental and Social Category B" operation under that OP/BP. The Project will be implemented in areas that are expected to be (Component 1) and will be (Component 2) hit severely by the El Niño phenomenon and the potential eruption of Cotopaxi (it could be another type of natural disasters for areas of intervention under Component 2), or any other Eligible Disaster. Given the magnitude of expected damage caused by both events, the Project was designed to provide rehabilitation and recovery support to affected areas in which public infrastructure and services delivery result severely impacted. The civil works initially identified and planned for preventive action under Component 1 were mostly rehabilitative works and minor in scale and thus site-specific, except for: (i) three dredging civil works by EPA, and (ii) temporary shelters for cattle to prevent livestock loss in case of a potential Cotopaxi eruption, proposed by MAGAP. Said works would have required preparation, consultation and disclosure of specific EMPs, but neither the dredging activities nor the construction of cattle shelters finally went ahead under Component 1. Under Component 2 dedicated to recovery and reconstruction phase, investments were initially expected to focus on rebuilding and rehabilitating existing transport/road and water/sanitation/flood protection infrastructure and crop and livestock production. After the earthquake on April 16, 2016, the investments opened up to the possibility of including rehabilitation/(re)construction of strategic infrastructure and public buildings such as hospitals/health centers, schools, and airports. In particular in case of hospitals, new construction can also be considered. In any case, the ESSAF includes a negative list to exclude any potential "Category A" investment from Project funding, and in principle the screening is designed so that there are no significant or irreversible environmental impacts that are anticipated from Project-financed activities.

2. Describe any potential indirect and/or long term impacts due to anticipated future activities in the project area:

Not applicable.

3. Describe any project alternatives (if relevant) considered to help avoid or minimize adverse impacts.

Not applicable to the main bulk of the planned preventive and response works. Regarding the temporary cattle shelters, temporary resettlement of cattle in existing ranches outside the potentially affected area of the Cotopaxi Volcano was considered. This alternative was not pursued, however, due to the complexity of the related planning, social negotiation needs and logistics.

4. Describe measures taken by the borrower to address safeguard policy issues. Provide an assessment of borrower capacity to plan and implement the measures described.

The proposed Project was prepared and will be implemented according to Paragraph 12 of the World Bank's Operational Policy 10.00, which allows for certain exceptions to the investment project financing policy requirements, including deferral of safeguards requirements. Initially in October 2015, the GoE requested assistance from the WB and the WB decided to follow OP 10.00 (paragraph 12) because Ecuador was facing two imminent natural hazards that could cause major damages and

losses (estimated at US\$6 billion in total) at any time during the next 0 to 24 months, and have an important negative impact on the economic and social development of the country: (i) a potential eruption of the Cotopaxi Volcano, and (ii) potential adverse effects from the 2015-16 El Niño phenomenon. On April 16, 2016, about one month after Board approval and one week before Project signing (April 22 2016), a 7.8 magnitude earthquake hit the coastal Ecuador and Component 2 was activated.

The exception allowing for deferral of environmental and social requirements was granted for this Project and, in accordance with WB policies, the WB and GoE prepared and agreed on a Safeguards Action Plan (SAP), a Project-level safeguards planning document that provided a time-bound plan setting forth the steps and the sequential planning and coordination for Project activities and the preparation by the GoE of the relevant safeguards instruments to ensure compliance with the safeguards requirements. The SAP is guided by the dual objective of ensuring that there is a roadmap for safeguards compliance during Project implementation and providing clear guidance to the GoE on the types of actions and instruments required so as to facilitate speedy implementation of emergency services.

The deferral was requested for postponing the disclosure of safeguards instruments to after Appraisal (which took place on December 17, 2015). Site-specific safeguards instruments (EMPs and, if necessary, IPPs and/or RAPs) and environmental authorizations by the Ministry of Environment (MAE), as needed per the national legislation, are required for all investments financed under the Project; also those subject to retroactive financing under Component 1. The scope and depth of the EMPs vary based on each sub-project's environmental category as per the WB OP 4.01, and the necessary environmental authorization as per the national legislation. The safeguards instruments must be ready and acceptable to the WB and the environmental authorizations processed as early as possible, and latest before works start on the ground. However, exceptions to processing the environmental authorizations as per the national legislation may be possible if properly justified based on an emergency situation, yet always subject to a written agreement by the MAE. MF and the responsible co-executing agency will disclose the Project-related environmental authorizations and the EMPs that go beyond application of environmental and social good practices and require consultation with potentially affected people. The WB will also disclose the latter through the WB InfoShop (the external WB website). To address the above referred aspects, each co-executing agency counts at least with the minimum of environmental staff and management capacity to deliver the required environmental management with WB assistance. Each agency has named a responsible staff to contribute to preparation and implementation of the Project's social and environmental management instruments.

The co-executing agencies prepared with MF and WB support an Environmental and Social Screening and Assessment Framework (ESSAF) for the Project to ensure identification and adequate management of social and environmental issues and risks relating to Project implementation. The ESSAF includes an Indigenous Peoples Planning Framework (IPPF) that covers specific guidance on how to effectively and pro-actively engage indigenous communities as well as procedures to be used for screening all activities identified post-appraisal, to ensure they maximize social benefits and avoid causing any potential adverse impacts. The ESSAF also includes a Resettlement Policy Framework (RPF) prepared in accordance with OP 4.12, providing guidance for land acquisition in the event that any sub-project requires it. The RPF reflects the two following principles: 1) Prior to the approval of sub-projects, the responsible agency needs to ensure that the sites, boundaries and ownership of the related land plots are clearly identified and confirmed by presenting a legal title; and 2) For all activities (preparation and emergency response phases), the responsible agency is obliged to develop and implement a Resettlement Action Plan (RAP) in case of involuntary resettlement, including

agreement and payment of compensation measures with fiscal/other than Project funds prior to the commencement of works for that particular sub-project. However, rapid implementation support will be made available by the WB to help with the preparation of the instruments. Guidance will also be provided on conducting rapid social assessments, and simplified templates made available for the completion of site-specific RAPs when required. The ESSAF also includes a section on environmental good practices focused on civil works.

Beyond the IPPF and RPF, the ESSAF consists of:

- i. Screening methodology for all types of potential civil works related with rehabilitation of water and road infrastructure, and restoration of crop and livestock production to identify relevant environmental and social issues and risks, as well as environmental enhancement opportunities. The screening facilitates determining the relevant national requirements related to environmental, health and safety management and the applicability of the WB's Operational Policies on environmental and social safeguards. Said methodology includes a negative list to exclude any potential "Category A" investment from Project funding, or investments that would result e.g. in negative impacts on any type of forest, protected area/buffer zone and/or physical cultural resources.
- ii. Description of potential negative environmental and social impacts of the expected types of Project activities/investments, as well as applicable prevention/mitigation measures and good practices.
- iii. Description of the basic content required for site specific EMPs to be completed and customized for each sub-project based on the results of site screening to specify the siting, design, demolition/land clearing, and construction management requirements for construction and other physical activities.
- iv. Procedures, roles and responsibilities for carrying out and approving site screening templates and site specific EMPs, ensuring that sub-project siting, designs, plans, specifications and implementation plans reflect the environmental screening outcomes and EMP requirements are compliant with applicable WB safeguards and meet relevant policies/acts, strategies/rules and regulations of GoE.
- v. Description of the applicable public communication tools and procedures and a multi-tiered Grievance Redress Mechanism (GRM) to receive and handle complaints relating to exclusion and inclusion errors during beneficiary targeting, those adversely affected by the Project, and delivery of Project benefits. Such mechanisms will rely on existing community institutions, the co-executive agencies, and the overall Project coordination by the MF, as applicable.
- vi. Generic sub-project safeguards supervision/monitoring template for rehabilitation works to record compliance with the sub-project specific safeguards instruments (EMP, IPP, RAP). These will be administered by the responsible co-executive agency that will mobilize the personnel needed to provide close technical support and supervision at the local level.

As stated above, each civil work will count with the necessary and minimum environmental permitting requirements by the national legislation. Each will also have an applicable EMP, whose level of detail and scope depends on the type of activity, as acceptable to the WB. EMPs that go beyond application of good environmental and social practices and require consultations will be disclosed in-country and on the WB InfoShop (the external WB website). In practice, preventive maintenance or rehabilitation/reconstruction of road sections and maintenance of canals and irrigation systems will rely on environmental and social good practices specified for the type of works and natural and human environment in question. Use of retroactive financing to cover costs of Component 1 requires that the GoE and Project-financed contractors and supervisors comply with sound social and environmental practices. For all the requests the GoE presents to the WB for retroactive financing for past and completed works: for those works to be eligible for retroactive financing, the responsible co-executing agency will have to show evidence that they complied with the applicable WB fiduciary and safeguards requirements.

Environmental monitoring, evaluation and reporting on environmental and social management will be part of the Project implementation process and local authority reporting system. During construction, contractors will keep records of all activities carried out on the Project site, which will be submitted to the responsible co-executing agency. Departmental environmental officials will be responsible for monitoring at the local level on a quarterly basis. Compliance with adequate environmental and social screening will be monitored based on evaluation and progress reports, feedback meetings and implementation support missions.

Awareness on environmental mitigation measures: The ESSAF also outlines provisions applicable in awareness/orientation sessions for environmental and social training aimed at contractors of civil works. Appropriate training will cover areas such as: screening of impacts, policy and legal framework on environment and construction, disposal of solid and liquid waste from premises, and measures to prevent the spread and contraction of HIV/AIDS. Environmental and social rules for contractors will be incorporated within construction bids and contracts to enhance obligations on contractors.

Regarding the participating agencies' capacity to plan and implement pertinent social and environmental management, each agency counts/will need to count at least with the minimum of environmental staff and management capacity to deliver the Project-required social and environmental management with Bank assistance. Each planned civil work counts or will count with the necessary and minimum environmental permitting requirements by the national legislation. While the co-executing agencies have no direct or limited experience in implementing Bank funded projects and may be unfamiliar particularly with the Bank social safeguard policies, over the past decades the GoE has implemented important pro-poor policies and taken steps in the inclusion of indigenous peoples and other minorities. All the initially included four co-executing agencies have experience in the consultation and dialogue with indigenous communities. For example, the Ministry of Health includes a Division for Intercultural Health. In the absence of a staff member focused solely on social issues in the co-executing agencies, the Project coordinators will oversee and coordinate social safeguards aspects.

Overall, the Project is expected to contribute to enhance the GoE's capacity of social and environmental management in disaster prevention and response. During Project implementation, the Bank team will facilitate the co-executing agencies safeguards related training on an as-needed basis.

5. Identify the key stakeholders and describe the mechanisms for consultation and disclosure on safeguard policies, with an emphasis on potentially affected people.

The key Project stakeholders are the public institutions in charge of disaster prevention and response. The potentially affected people are determined mainly based on their geographic location and socio-economic factors that contribute to their vulnerability.

Regarding the initially planned canal clean-up works, EPA would disseminate near-by landowners the message on the availability of sediment for potential and strictly voluntary material disposal in private lands. The Project will apply a protocol to verify the voluntary disposal of dredged materials and include it in the social and environmental management of each investment, as applicable.

Regarding gender, it is well documented in the literature that gender and equality have a strong link to disaster vulnerability and resilience. However, the planned Project investments will be mostly gender neutral, as they focus on maintenance and rehabilitation/reconstruction of existing infrastructure. In view of Cotopaxi's potential eruption, the Ministry of Social and Economic Inclusion (MIES) has taken into account gender implications through the sectoral working groups (*mesas temáticas*), and included them into contingency plans for activities such as temporary shelters and non-food items.

However, the activities in need of a strong gender mainstreaming will be covered by other sources of funding. The Project will take gender into account in its broadest terms by disaggregating number of beneficiaries.

Regarding citizen engagement, the Project will include a strong citizen engagement component in the road maintenance and rehabilitation activities implemented by the MTOP. The MTOP implements a participatory methodology in the road maintenance across the country by small groups of people (10 to 20 persons on average) that become registered as a community based organization / microenterprise and carry out small manual labor activities under the supervision of the Ministry's staff. These microenterprises are paid formally and contribute in taxes. The Project will also include a grievance redress indicator at the intermediate level. The co-executing agencies will have the responsibility to document and resolve grievances. The involved co-executing agency will follow up on the grievances and report them to the PIU. The agreed upon arrangements for public disclosure and stakeholder participation are detailed in Section 6.3 of the ESSAF.

Regarding the disclosure of the ESSAF, an advanced draft was published in-country on February 4 and at the Bank InfoShop on February 8, 2016. Subsequently, the GoE organized consultations on the draft ESSAF in Quito, Guayaquil, Montecristi and Santo Domingo, with participation by a total of 115 people representatives of relevant GoE agencies, provincial and local authorities, construction and engineering professionals and civil society to collect feedback and contributions to the final document. Participants in the consultations were overall interested in the Project and its scope, as well as in the ESSAF, acknowledging they present an adequate project design and management of related environmental aspects and any potential impact on human settlements. Questions related with the project coverage and the institutional and operational arrangements in terms of inter-institutional collaboration between the MF, MAE, and the co-executing agencies. More specifically, in the consultation events organized by EPA, community and political leaders and other social actors expressed their satisfaction on the planned and on-going flood protection works, and additional sub-project needs were presented. In the consultation events organized by MTOP, questions were raised on the road sections selected for preventive maintenance, including the scope, beneficiaries, timing and required environmental authorizations of said works. The conducted consultations are presented in detail in Section 7 and Annex 8 of the ESSAF. The final ESSAF – that in every case remains object of continued improvement as Project implementation proceeds – was disclosed in-country and at the Bank InfoShop on April 22, 2016 before Project effectiveness.

B. Disclosure Requirements (N.B. The sections below appear only if corresponding safeguard policy is triggered)

Environmental Assessment/Audit/Management Plan/Other	
Date of receipt by the Bank	21-Apr-2016
Date of submission to InfoShop	22-Apr-2016
For category A projects, date of distributing the Executive Summary of the EA to the Executive Directors	
"In country" Disclosure	
Ecuador	22-Apr-2016
<i>Comments:</i> An advanced draft of the ESSAF was prepared and disclosed in-country and at the Bank InfoShop in early February 2016. Subsequently, consultations were organized on the draft ESSAF with relevant GoE agencies, local authorities and civil society representatives to collect feedback and contributions to the final document that was disclosed in-country and at the Bank InfoShop on April	

22, 2016 before Project Effectiveness.	
Resettlement Action Plan/Framework/Policy Process	
Date of receipt by the Bank	21-Apr-2016
Date of submission to InfoShop	22-Apr-2016
"In country" Disclosure	
Ecuador	22-Apr-2016
<i>Comments:</i> An advanced draft of the RPF was prepared and disclosed in-country and at the Bank InfoShop in early February 2016. Subsequently, consultations were organized on the draft RPF with relevant GoE agencies, local authorities and civil society representatives to collect feedback and contributions to the final document that was disclosed as Annex 10 of the ESSAF in-country and at the Bank InfoShop on April 22, 2016 before Project Effectiveness.	
Indigenous Peoples Development Plan/Framework	
Date of receipt by the Bank	21-Apr-2016
Date of submission to InfoShop	22-Apr-2016
"In country" Disclosure	
Ecuador	22-Apr-2016
<i>Comments:</i> An advanced draft of the IPPF was prepared and disclosed in-country and at the Bank InfoShop in early February 2016. Subsequently, consultations were organized on the draft IPPF with relevant GoE agencies, local authorities and civil society representatives to collect feedback and contributions to the final document that was disclosed as Annex 9 of the ESSAF in-country and at the Bank InfoShop on April 22, 2016 before Project Effectiveness.	
Pest Management Plan	
Was the document disclosed prior to appraisal?	No
Date of receipt by the Bank	3-Mar-2016
Date of submission to InfoShop	22-Apr-2016
"In country" Disclosure	
Ecuador	22-Apr-2016
<i>Comments:</i> Pest Management OP 4.09 is triggered as Component 1 will finance personal protection equipment for safe handling of chemical larvicides to control mosquitos as vectors for several diseases that are expected to spread due to the El Niño effects and might cause increased use of chemicals. An assessment of MSP's capacity and adequacy of their system for managing chemicals was conducted before Project effectiveness. Annex 13 of the ESSAF, Emergency Plan for Vector Control, includes a detailed description of the related socio-environmental management by MSP.	
If the project triggers the Pest Management and/or Physical Cultural Resources policies, the respective issues are to be addressed and disclosed as part of the Environmental Assessment/Audit/or EMP.	
If in-country disclosure of any of the above documents is not expected, please explain why::	
Regarding PCR, the Project applies a precautionary principle to trigger OP/BP 4.11 particularly as the actual scale and location of the potential natural disaster impacts and the related response investments are still unknown. Chance finds of cultural artefacts may neither be ruled out during Project	

implementation. The ESSAF specifies appropriate requirements for screening of investments, and sub-project EMPs will include appropriate management measures in case any known cultural resources might result affected by any sub-project.

C. Compliance Monitoring Indicators at the Corporate Level (to be filled in when the ISDS is finalized by the project decision meeting) (N.B. The sections below appear only if corresponding safeguard policy is triggered)

OP/BP/GP 4.01 - Environment Assessment						
Does the project require a stand-alone EA (including EMP) report?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
If yes, then did the Regional Environment Unit or Practice Manager (PM) review and approve the EA report?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Are the cost and the accountabilities for the EMP incorporated in the credit/loan?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
OP/BP 4.04 - Natural Habitats						
Would the project result in any significant conversion or degradation of critical natural habitats?	Yes	<input type="checkbox"/>	No	<input checked="" type="checkbox"/>	NA	<input type="checkbox"/>
If the project would result in significant conversion or degradation of other (non-critical) natural habitats, does the project include mitigation measures acceptable to the Bank?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>
OP 4.09 - Pest Management						
Does the EA adequately address the pest management issues?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Is a separate PMP required?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
If yes, has the PMP been reviewed and approved by a safeguards specialist or PM? Are PMP requirements included in project design? If yes, does the project team include a Pest Management Specialist?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
OP/BP 4.11 - Physical Cultural Resources						
Does the EA include adequate measures related to cultural property?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Does the credit/loan incorporate mechanisms to mitigate the potential adverse impacts on cultural property?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
OP/BP 4.10 - Indigenous Peoples						

Has a separate Indigenous Peoples Plan/Planning Framework (as appropriate) been prepared in consultation with affected Indigenous Peoples?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
If yes, then did the Regional unit responsible for safeguards or Practice Manager review the plan?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
If the whole project is designed to benefit IP, has the design been reviewed and approved by the Regional Social Development Unit or Practice Manager?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>
OP/BP 4.12 - Involuntary Resettlement						
Has a resettlement plan/abbreviated plan/policy framework/process framework (as appropriate) been prepared?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
If yes, then did the Regional unit responsible for safeguards or Practice Manager review the plan?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Is physical displacement/relocation expected?	Yes	<input type="checkbox"/>	No	<input checked="" type="checkbox"/>	TBD	<input type="checkbox"/>
Is economic displacement expected? (loss of assets or access to assets that leads to loss of income sources or other means of livelihoods)	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	TBD	<input checked="" type="checkbox"/>
OP/BP 4.36 - Forests						
Has the sector-wide analysis of policy and institutional issues and constraints been carried out?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>
Does the project design include satisfactory measures to overcome these constraints?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>
Does the project finance commercial harvesting, and if so, does it include provisions for certification system?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>
OP/BP 4.37 - Safety of Dams						
Have dam safety plans been prepared?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>
Have the TORs as well as composition for the independent Panel of Experts (POE) been reviewed and approved by the Bank?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>
Has an Emergency Preparedness Plan (EPP) been prepared and arrangements been made for public awareness and training?	Yes	<input type="checkbox"/>	No	<input type="checkbox"/>	NA	<input checked="" type="checkbox"/>

The World Bank Policy on Disclosure of Information						
Have relevant safeguard policies documents been sent to the World Bank's Infoshop?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Have relevant documents been disclosed in-country in a public place in a form and language that are understandable and accessible to project-affected groups and local NGOs?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
All Safeguard Policies						
Have satisfactory calendar, budget and clear institutional responsibilities been prepared for the implementation of measures related to safeguard policies?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Have costs related to safeguard policy measures been included in the project cost?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Does the Monitoring and Evaluation system of the project include the monitoring of safeguard impacts and measures related to safeguard policies?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>
Have satisfactory implementation arrangements been agreed with the borrower and the same been adequately reflected in the project legal documents?	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/>	NA	<input type="checkbox"/>

V. Contact point

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VII. Approval

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<i>Approved By:</i>		
Safeguards Advisor:	Name: Agi Kiss (Acting SA)	Date: 02-June-2016
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Country Director:	Name: Alberto Rodriguez (CD)	Date: 10-June-2016