INTEGRATED SAFEGUARDS DATA SHEET
CONCEPT STAGE

Report No.: ISDSC13944

Date ISDS Prepared/Updated: 07-Nov-2016
Date ISDS Approved/Disclosed: 15-Nov-2016

I. BASIC INFORMATION

A. Basic Project Data

Country: Peru
Project ID: P151851
Project Name: Peru Integrated Water Resources Management (P151851)
Task Team Leader(s): Erwin De Nys, Habab Taifour
Estimated Appraisal Date: 16-Jan-2017
Estimated Board Date: 30-Mar-2017
Managing Unit: GWA04
Lending Instrument: Investment Project Financing

Financing (In USD Million)

Total Project Cost: 80.00
Total Bank Financing: 40.00
Financing Gap: 0.00

<table>
<thead>
<tr>
<th>Financing Source</th>
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<tbody>
<tr>
<td>Borrower</td>
</tr>
<tr>
<td>International Bank for Reconstruction and Development</td>
</tr>
<tr>
<td>Total</td>
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<table>
<thead>
<tr>
<th>Amount</th>
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<tbody>
<tr>
<td>40.00</td>
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<tr>
<td>40.00</td>
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<td>80.00</td>
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Environmental Category: B - Partial Assessment

Is this a Repeater project? No

B. Project Objectives

The proposed Project Development Objective (PDO) is to strengthen the Borrower's capacity for the management of water resources at the national level and in selected river basins.

C. Project Description

The proposed Project will have the following components:

Component 1: Improving IWRM capacity at the national level (US$26.00 million).

This component aims at improving the management of water resources at the national level through the development and operationalization of new methodologies and tools that will address the
identified challenges in the following areas: (i) development of information products and analytical tools to support decision making for the management of water resources; (ii) conjunctive management of surface and groundwater in critical valleys; and (iii) management of dam safety. Elements included under this component are:

a. Development of information products to support decision making for the management of water resources

Activities under this subcomponent would support the strengthening of the existing National Water Resources Information System to deliver better information products to support water resources management. This will be achieved through improving ANA's hydro-meteorological information network for data acquisition, strengthening water data bases and back-up systems, developing decision-making modelling tools for water resources management, and improving information accessibility to end-users.

b. Evaluation and management of groundwater

Activities under this subcomponent would promote the conjunctive use of surface and groundwater in the aquifers of the Ica Valley and Villacuri in the Ica region and of La Yarada in the Tacna region to contribute to the reduction of over-exploitation. This will be achieved mainly through the creation of a stakeholders committee for the management and monitoring of the aquifer; the preparation of participatory aquifer management plans and the implementation of a system for the monitoring and control of groundwater.

c. Dam Safety

This subcomponent would strengthen ANA's regulatory framework and technical capacity for the management of dam safety. This will be done through: the definition of an improved institutional framework for dam safety management; the creation of a regulatory framework for dam safety management; the development of technical guidelines for dam monitoring, risk assessment and emergency plans formulation; the creation of a dam safety information platform; and the formulation and partial implementation of dam safety management plans for 6 major dams in the Pacific watershed.

d. Economic Incentives

This subcomponent would support ANA in the strengthening of economic incentives for increased water use efficiency and reduced pollution into water bodies as established in the Water Resources Law. This will include the revision of the water use and discharge charges; measures to increase its coverage and collection rate; and definition of rules and mechanisms to use part of those revenues to promote the implementation of basin water plans.

Component 2: Improving IWRM capacity at the basin level (US$47.00 million).

This component aims at improving the management of water resources at basin level through: (i) the consolidation of the CCs established under the previous IBRD and IDB Projects in the Pacific watershed; and (ii) improving IWRM in new prioritized river basins in the Atlantic watershed where very little experience exists (Alto Mayo, Mantaro, Urubamba-Vilcanota and Pampas) Elements included under this component are:
a. Consolidation of the existing CCs: in the Pacific watershed (Chancay-Labayeque, Chancay-Huaral, Quilca Chili, Tumbes, Chira-Piura, Laocumba-Sama-Caplina)

The aim of this subcomponent is to strengthen the capacity of the existing CCs, inter alia:

i) Monitoring the implementation of the River Basin Management Plans; including establishment of economic retribution of water use and discharge fees to incentivize efficient use of water resources as well as evaluating the creation of a Water Fund, using a share of the water resource use and contamination fees.

ii) Supporting the enhancement of hydro-meteorological observation networks in rivers and reservoirs as well as facilitating two-way stream of communication that allows CCs to contribute monitoring data (generated by public or private sources) to the NWRS and obtain information necessary to support informed decision making.

iii) Developing and implementing flood forecast systems and formulating flood management plans for the six river basins.

iv) Developing and implementing information systems and management tools for the monitoring, control and enforcement of water abstractions.

v) Developing and implementing information systems and management tools for the monitoring of water quality and the control of illegal discharges to rivers and aquifers.

vi) Support the CCs in the prioritization and formulation of investment projects that are part of the approved River Basin Management Plans.

b. Improving IWRM in new prioritized river basins in the Atlantic watershed (Alto Mayo, Mantaro, Urubamba-Vilcanota and Pampas).

The proposed interventions target central highlands (sierra) and rainforest (selva) basins that face a different set of challenges. This subcomponent aims at improving IWRM in new prioritized river basins in the Atlantic watershed through a series of activities that will be tailored to the challenges and needs of each basin. Interventions at basin level will include a combination of the following activities:

i) Establishment of River Basin Water Resources Councils/Committees;

ii) Development of participatory River Basin Water Resources Management Plans;

iii) Creation of water quality monitoring programs including establishment of discharge standards and the installation of automatic water quality measurement equipment in the coordination with the Ministry of Environment;

iv) Implementation of Cultura de Agua program aims at raising awareness and creating structured stakeholder involvement and outreach for the management and preservation of water resources;

v) Development of basin-specific WRM instruments - to address key challenges. Instruments include, inter alia: simulation, optimization and decision support models/tools for flood and drought management and adaptation to climate change; payment of environmental services program; plans for the O&M of major hydraulic infrastructure; conflict resolution schemes and, support in the formulation of investment projects that are part of the River Basin Water Resources Management Plans.

vi) Development of monitoring network design and implementation of real-time automated monitoring of water levels and existing water abstractions.
Component 3: Project Management and Supervision (US$7.00 million).
This component would support Project management and implementation, including monitoring and evaluation.

D. Project location and salient physical characteristics relevant to the safeguard analysis (if known)
The project will support development of governance structures, methodologies and tools to improve water resources management in different regions of Peru. According to the information provided in the section on components above, the following region will be involved: San Martin, Cusco, Apurimac, Ayacucho, Junin, Huancavelica, Ica and Tacna. Some of these regions are exposed to intense deforestation and biodiversity loss such as the Amazon region of San Martin. Coastal regions such as Ica and Tacna are exposed to overexploitation of aquifers. In the case of Andean regions such as Apurimac, Ayacucho, Huancavelica and Cusco they have faced droughts during the El Niño event and flash floods during the rainy season. Location of the five dams to be assessed is not known yet.

E. Borrowers Institutional Capacity for Safeguard Policies
This is the ANA's second World Bank-financed water resources management Project. It is expected that a new PIU within ANA is going to be responsible for implementation of the proposed Project.

Some of the current ANA staff members and consultants were part of the former Water Resources Management Modernization Project Implementation Unit (PIU) so they have relevant experience with WB safeguard policies as well as social and environmental management issues. At present there is a seasoned environmental specialist at ANA's headquarters in Lima. The environmental and social capacity of this PIU will be strengthened with dedicated environmental and social specialists not only in the field but also at the central level in Lima. Capacity building needs on environmental and social management issues will be assessed in depth during Project preparation.

The former project was characterized for being a highly participatory process from beginning to end. This experience in social aspects is a legacy the PIU has and will be use for the current project. The PIU will include a social specialist in the central level as well as social specialists for the basins where they could be required.

F. Environmental and Social Safeguards Specialists on the Team
Alonso Zarzar Casis (GSU04)
Raul Tolmos (GEN04)

II. SAFEGUARD POLICIES THAT MIGHT APPLY

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<th>Safeguard Policies</th>
<th>Triggered?</th>
<th>Explanation (Optional)</th>
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<tbody>
<tr>
<td>Environmental Assessment</td>
<td>Yes</td>
<td>Based on OP 4.01 on Environmental Assessment the Project is categorized as a Category B risk one. This Project will not finance civil work contracts nor detail designs of civil works. Installation of hydrometeorological stations might include preparation of terrain and related minor civil works as part of contracts for equipment installation. The Project will support the formulation of different types of water</td>
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plans: (i) plans for the operation and maintenance of major hydraulic infrastructure; (ii) risk management plans in five priority dams; and (iii) participatory aquifer management plans in selected regions (Tacna and Ica). Activities prioritized in those plans, will not be implemented by the Project, however some of them may have potential adverse social and environmental impacts and risks. For this reason, the operational policy on Environment Assessment (OP/ BP 4.01) policy is triggered. To ensure conformity with this policy, the methodology/terms of reference for the formulation of those plans will include specific reference to understanding and identifying potential social and environmental risks and impacts. Preparation of these plans will follow rigorous consultation processes with relevant stakeholders (e.g. farmer associations, peasant communities, indigenous groups, water and sanitation service utilities, mining companies, electricity generation utilities, local water authorities, etc.) through workshops and meetings convened by the Subnational Government or corresponding Basin Council. Terms of Reference will also include a comprehensive assessment of key relevant environmental and social impacts and risks and corresponding mitigation measures and be subject to prior review by the Bank. In particular, technical assistance activities will be subject to the guidelines contained in the document entitled Interim Guidelines on the Application of Safeguard Policies to Technical Assistance (TA) Activities in Bank-Financed Projects and Trust Funds Administered by the Bank.

Project funds will not be used for any sort of pre-investment planning (pre-feasibility, feasibility, detailed engineering designs, etc.). ANA does not have the mandate to implement investments, which are under the purview of the regional and local governments. The proposed project will help carry out basin level hydrological assessments (including simulation of existing and potential infrastructure) to ensure adequate water resources are available to sustain various productive uses of water (agriculture, energy, municipal, environmental flows, etc.). An Environmental and Social Management Framework (ESMF) will be prepared by the National Water Agency (ANA) before appraisal. This ESMF will
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<th>Policy</th>
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<th>Description</th>
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<tr>
<td>Natural Habitats OP/BP 4.04</td>
<td>Yes</td>
<td>This safeguard policy is triggered. While the basic objective of IWRM plans are to balance the differing and potentially competing uses for water, the environmental impacts on habitats can be significant if the plans are more heavily balanced toward activities that impact the aquatic resource. The plans should be backed up by not only hydrological modeling but also solid studies of the natural resources dependent on the water flow regimes in quantity, quality, and periodicity.</td>
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<td>Forests OP/BP 4.36</td>
<td>Yes</td>
<td>This policy should be triggered since the project area comprises the Alto Mayo River Basin in the Amazon region, a highly deforested river basin located in the San Martin region. Development of a participatory River Basin Water Resources Management Plan might involve preparation of forest management plans and corresponding reforestation activities given the close link between water quality and availability and tropical forest cover in this part of the Peruvian Amazon region. No specific instrument will be developed for this policy but the TORs for the formulation of the IWRM plan in this basin should particularly address this issue.</td>
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<td>Pest Management OP 4.09</td>
<td>No</td>
<td>This policy will not be triggered since the project does not involve procurement or use of pesticides.</td>
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<td>Physical Cultural Resources</td>
<td>Yes</td>
<td>This policy should be triggered since development of participatory River Basin Water Resources Management Plans in selected Andean basins such as Mantaro, Urubamba-Vilcanota and Pampas might include structural and non-structural activities in settings characterized by the presence of known and unknown physical cultural resources. No specific instrument will be developed for this policy but the TORs for the formulation of the IWRM plan will screen impacts and risks on physical cultural resources.</td>
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<tr>
<td>Indigenous Peoples OP/BP 4.10</td>
<td>Yes</td>
<td>This policy is triggered because the project under Component 2 b will support participatory river basin water resources management plans and several of the...</td>
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Social assessments be carried out and tools will be developed to ensure adequate representation and participation of indigenous communities in project activities, and to ensure that specific issues and knowledge of indigenous people, including indigenous forest dependent communities, are adequately identified, assessed and taken into consideration, particularly in the preparation of the water management and forest management plans.

ANA will prepare an IPPF to be applied in the basins where Indigenous Peoples are present.

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<th>Safety of Dams OP/BP 4.37</th>
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<td>This policy should be triggered. Although the project will not support the construction or rehabilitation of dams nor will support other investments which rely on the performance of existing dams, the Bank project will directly be involved in the operational aspects of an existing dam through the preparation/update of the safety and instrumentation plans. These need to be prepared in a manner and content consistent with OP/BP 4.37 especially in cases involving large dams as defined by the policy.</td>
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Projects on International Waterways OP/BP 7.50

| No |
| This policy should not be triggered because the project will not support activities which affect international waterways as defined under the policy. Therefore the policy is not triggered. However, development of the IWRM planning methodologies will review any riparian issue. |
| Projects in Disputed Areas OP/ BP 7.60 | No | This policy should not be triggered as the project will not finance activities in disputed areas as defined in the policy. |

III. SAFEGUARD PREPARATION PLAN

A. Tentative target date for preparing the PAD Stage ISDS: 04-Dec-2017

B. Time frame for launching and completing the safeguard-related studies that may be needed.
   The specific studies and their timing¹ should be specified in the PAD-stage ISDS:
   Apart from the new ESMF to be prepared by ANA, the National Water Authority (ANA) will also prepare new social safeguard instruments such as an IPPF.
   The IPPF will take into account the former IPPF prepared for the previous project because the current project will include some of the basins that were supported by the previous project. However the current project will also include new basins and therefore the borrower has agreed to prepare a new IPPF.
   The IPPF will set the procedures and principles to follow for consulting in the field during implementation whenever there is presence of Indigenous Peoples in project areas, as required by OP 4.10. Before appraisal the borrower will consult the IPPF with national indigenous organizations, both from the Amazon basin as well as from the highlands. The borrower has expressed his intention to invite to Lima some of the local indigenous leaders from the basins where the project will be implemented to take part in this national consultation.

IV. APPROVALS

| Task Team Leader(s): | Name: Erwin De Nys, Habab Taifour |
| Approved By: |
| Safeguards Advisor: | Name: Agnes I. Kiss (SA) | Date: 15-Nov-2016 |
| Practice Manager/ Manager: | Name: Rita E. Cestti (PMGR) | Date: 15-Nov-2016 |

¹ Reminder: The Bank's Disclosure Policy requires that safeguard-related documents be disclosed before appraisal (i) at the InfoShop and (ii) in country, at publicly accessible locations and in a form and language that are accessible to potentially affected persons.