I. BASIC INFORMATION

A. Basic Project Data

<table>
<thead>
<tr>
<th>Country</th>
<th>Peru</th>
<th>Project ID:</th>
<th>P157043</th>
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<tr>
<td>Country Name</td>
<td>Peru</td>
<td>Parent Project ID (if any):</td>
<td></td>
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<tr>
<td>Project Name:</td>
<td>Modernization of Water Supply and Sanitation Services (P157043)</td>
<td></td>
<td></td>
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<tr>
<td>Region</td>
<td>LATIN AMERICA AND CARIBBEAN</td>
<td></td>
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<td>Estimated Appraisal Date:</td>
<td>29-May-2017</td>
<td>Estimated Board Date:</td>
<td>14-Jul-2017</td>
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<td>Practice Area (Lead):</td>
<td>Water</td>
<td>Lending Instrument:</td>
<td>Investment Project Financing</td>
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<td>Borrower(s)</td>
<td>Republic of Peru</td>
<td></td>
<td></td>
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<tr>
<td>Implementing Agency</td>
<td>The Technical Organization for the Administration of WSS services (OTASS)</td>
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<th>Financing (in USD Million)</th>
<th>Amount</th>
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<td>Borrower</td>
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<td>International Bank for Reconstruction and Development</td>
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<tr>
<td>Total Project Cost</td>
<td>200.00</td>
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- Environmental Category: B-Partial Assessment
- Concept Review Decision: Track II - The review did authorize the preparation to continue
- Is this a Repeater project? No
- Other Decision (as needed): 

B. Introduction and Context

Country Context

With an average Gross Domestic Product (GDP) growth rate of 6.1 percent during 2003-13, Peru has been one of the Latin-American region's fastest growing economies over the last decade. The effects of this strong growth on employment and incomes have yielded an important decline in poverty rates, with extreme poverty dropping from 15.8 to 4.3 percent between 2004 and 2014. The country's Gini Index has also steadily declined from 0.49 to 0.44 during this period. Impending urbanization poses an
additional challenge as the poor who migrate to the cities generally settle in marginal peri-urban areas that generally lack access to basic social services, including water and wastewater.

Peru's economy has now entered a more challenging period. GDP growth slowed in 2014 as a result of adverse external conditions, a decline in domestic confidence, and reduced investments, although its growth rate remained above the regional average (2.4 versus 0.8 percent). Inflation, at 3.2 percent, was only slightly above the target rate for the year. This pattern of lower economic growth is expected to continue. Going forward, sustaining the pace of economic development and poverty reduction in times of lower external demand for commodities will require Peru to increasingly rely on higher productivity and export competitiveness.

Water security is a key issue with increasing water shortages in dry coastal regions, where two thirds of the country's population lives, receiving only about 1.8 percent of the national renewable fresh water resources, and where the country's major cities, including Lima (which receives on average 9mm of rain per year), are located. Most of Peru's abundant water resources are concentrated in the Amazon region, where less than 10 percent of the population lives and less than 10 percent of the country's GDP is generated. Climate change and impacts from the El Niño Southern Oscillation phenomenon has exasperated water scarcity and variability and increased the frequency of extreme events such as floods and drought that have adversely impacted lives and livelihoods. In light of increasing variability in availability of water resource there is a clear rationale for improving the efficiency of water management, in particular for water supply and sanitation services.

**Sectoral and Institutional Context**

The Water Supply and Sanitation (WSS) sector in Peru is organized in a manner in which policy-setting, enforcement, regulation, technical assistance and service-provision functions are allocated among national and sub-national institutions. The Ministry of Housing, Construction, Water Supply and Sanitation (Ministerio de Vivienda, Construcción y Saneamiento, MVCS), the governing body of the WSS sector, is in charge of policy making and national planning, including prioritization and allocation of national public investment in the sector. The Technical Organization for the Administration of WSS services (OTASS), created in 2013 by the Modernization Law within MVCS, is the sector apex institution, with a mandate to ensure compliance with the principles established in the Modernization Law, including issuing norms and standards for governance of EPSs, providing technical assistance; and more importantly, evaluating performance of the EPSs to determine the necessary corrective actions, such as intervention in the administration of those EPSs that fail to meet the performance targets or sanction service providers in case of noncompliance. The National Superintendence of Water and Sanitation Services (SUNASS) is an independent entity responsible for the regulation of quality of services and economic performance of urban WSS utilities (referred to as EPSs - Empresas Públicas de Saneamiento), as well as conflict resolution related to service complaints from customers. Regional and local governments are responsible for applying MVCS standards and policies to sector investments within their jurisdictions. The regional governments were previously mandated by law with the role of providing technical assistance (TA) to local governments and to service providers prior to the establishment of OTASS. WSS services in urban areas are primarily provided by EPSs. EPSs are incorporated as limited liability stock companies whose shares are owned by regional and local governments. EPSs currently serve over 85 percent of the urban population and more than 62 percent of the national population. Other service providers include Municipalities, through smaller utilities or municipal divisions (serving 9% of the population), and WSS Community Boards (Junta Administradoras de Servicios de Saneamiento, JASS) in the rural areas (serving 29% of the population).

Decentralization of responsibilities for the WSS sector was introduced by the Government of Peru
(GoP) through a series of regulations beginning in the early 1990s with the transfer of service provision responsibilities to the regional governments, with the exception of Sedapal, that remained under the responsibility of the national government. This was followed by regulations that outlined the objectives of the sector and created corporatized EPSs. The decentralization agenda has not delivered the expected results regarding access to sustainable services as well as the establishment of modern utilities. Weaknesses in the policy and institutional framework, overlapping planning and financing mechanisms, including budgetary allocations at various levels of government, and complex administrative norms are the primary causes of the limited success in the improvement of WSS services delivery. As a result, most EPSs in Peru still lag behind their peers in the Organization for Economic Co-operation and Development (OECD) and other Latin American countries in terms of technical and commercial efficiency as well as capacity to recover costs.

During the last decade, Peru has made steady progress in increasing WSS coverage, meeting the Millennium Development Goals (MDG) target in 2015. National coverage rates for WSS in 2015, were 87 percent for access to improved water sources and 76 percent for improved sanitation. It should be noted that the GoP has set much higher standards of service than those included under the wider definition of “improved services” of the Joint Monitoring Programme for Water Supply and Sanitation (JMP). In particular for sanitation, the GoP now defines coverage in terms of “dignified sanitation”, under which certain solutions, generally accepted in other developing country contexts, no longer qualify as coverage in Peru. Hence, according to GoP data, the actual coverage rates for WSS were 88 percent and 68 percent in 2015.

To support GoP initiatives in the water sector, the Bank has strategically engaged through a series of technical assistance and lending operations in urban WSS (with Sedapal), rural water supply and water resources management. Support to Sedapal to enhance demand-side management and improve efficiency in the Northern Service Area is ongoing through the Additional Financing of the Optimization of Lima Water and Sewerage Systems Project (90777-PE), which has recently expanded to cover new sectors in the Northern service area. The Bank has also provided guidance to key reforms for the management of water resources, which led to the approval of the Water Resources Law to address water scarcity and pollution. This law created the National Water Authority (Autoridad Nacional de Agua - ANA) with a clear mandate for integrated, participative basin-scale management of water resources. Through the Water Resources Management Modernization Project (47689-PE), the Bank has successfully promoted the implementation of the Water resources law through the creation, capacity building and operation of river basin organizations in three pilot basins and strengthened ANA at the central level to manage the country’s water resources. Throughout these engagements, the Bank has been an active partner in a joint donor group (Grupo Agua) that continues to provide technical assistance and guidance to the water sector in Peru.

The high priority given by the GoP to WSS is reflected in the considerable resources allocated to develop infrastructure. Within 2010-2015 the GoP spent on average US$1.45 billion per year on water and sanitation related investments, which represents a 5-fold increase in comparison to investments in the 1990s and 2000s with the aim of improving access, quality and efficiency of services. This level of investment represents 0.8 % of GDP and 13 % of the annual investment budget of the country, which is high for Latin American standards. Yet, results achieved by this sector are not commensurate with investments and spending levels. Lessons learned from the Bank’s long term engagement in the sector have highlighted that various challenges are preventing such level of expenditure to translate in the universalization of access and enhancement in service delivery. Those include: (i) inefficient Sector Policies; (ii) lack of sustainability and limited sector planning; (iii) levels of service fall short of expectations for Latin American Middle Income Countries like Peru; (iv) unfulfilled universal and equitable access agenda; and, (v) increasing pollution levels and environmental degradation.
Recognizing the urgency of these challenges, the Government is pursuing important legal and institutional changes for greater access and quality improvement of WSS services. To this end, the Water Sector Modernization Law (N° 30045, June 2013) was issued with the primary objective of promoting greater operational efficiency, accountability and financial autonomy of service providers. The WSS Services Modernization Law institutes measures to increase coverage and ensure the quality and sustainability of WSS services, while promoting development, and social inclusion. The Law's Regulation, passed in October 2013, establishes corporate autonomy as well as increasing economies of scale and environmental and social sustainability as the pillars of the modernization process. In December 2016 a series of legislative and regulatory changes were introduced to this law as well as the General Law of Water and Sanitation Services that is intended to lay the groundwork for reform in the sector.

**Relationship to CAS/CPS/CPF**

The proposed operation will directly contribute to the Government’s objectives set forth in the Modernization Law of increasing the coverage, quality and sustainability of sanitation services to promote development, environmental protection and social inclusion. The proposed Project is consistent with the objectives of the FY12-16 Country Partnership Strategy (CPS) (Report No.66187-PE), in particular Strategic Objectives III “connecting the poor the services and markets”, which highlights improved water supply and sanitation service provision as one of its results area and IV “improved public sector performance for greater inclusion”. In line with these objectives, the Project seeks to improve the policy and institutional framework of the sector and increase equitable access and sustainability of water supply and sanitation services.

**C. Proposed Development Objective(s)**

**Development Objective(s) (From PCN)**

The proposed Development Objective is to strengthen the institutional and policy framework for the sustainable management of the water and sanitation sector and for contributing to the turnaround of water supply and sanitation service provision in participating utilities (EPSs) in intermediate cities in Peru.

**Key Results (From PCN)**

The Proposed Development Objective (PDO) will be measured against the following indicators:

1. OTASS strengthened with adequate tools and capacities to fulfill its mandate (evaluate, provide technical assistance, intervene and sanction EPSs).
2. New sector policies providing adequate incentives for sustainable and efficient service delivery approved.
3. Increased number of households with connections to piped water supply and sanitation services.
4. Number of water utilities and other service providers with improved capacity to manage and plan their operations.
5. Water source protection, wastewater reuse protocols developed and piloted in selected EPSs.

**D. Concept Description**

To address the WSS sector challenges in a systematic manner, a long-term programmatic approach is proposed. This approach would demonstrate the Bank's commitment to the transformation of Peru’s WSS sector, including laying a strong policy and institutional foundation for sector development and sustainability. At the same time, it would provide the necessary flexibility for the phasing of investment operations to address opportunities and challenges as they emerge. Future possible
investment operations would be taken up when they are ready and based on performance in the earlier
investment operations under the program, with possible overlapping of investment operations as
appropriate.

The programmatic engagement proposed would be part of a wider package of World Bank services,
comprising: (i) analytical work, advisory and convening services; (ii) policy dialogue; and (iii)
knowledge sharing. These would include the different activities supported under the WSP funded
'Support to the Water Sector Modernization Program NLTA (P150824)'; the National Turnaround
Program included under the 'Global Study on Institutions, Policies and Incentives for WSS Services'
(P159124) and funded by the Water Partnership Program (WPP) and the Swiss State Secretariat for
Economic Affairs (SECO); and the Reimbursable Advisory Services for Increasing WSS services in
peri-urban areas of Lima. Moreover the program would complement ongoing lending operations:
Optimization of Lima Water and Sewerage Systems Project with Sedapal and the preparation of the
Peru Integrated Water Resources Management Project with ANA, thereby addressing water security in
Peru in a holistic manner.

The proposed program would support the Government of Peru in the implementation of the Water
Sector Modernization Program with the objective of putting the country in a path to meet the
Sustainable Development Goals (SDG) (in particular, SDG 6 that sets out to ensure availability and
sustainable management of water and sanitation for all) and supporting intermediate cities on their role
as enablers of economic growth. The overall budget envelope proposed for this particular operation
would be US$100 million in principle and subject to discussions with the GoP, with a total amount of
US$200 million for the whole program.

The proposed project would be the first in the series and constitute an incubator of new management
models, aimed at transforming performance and management of the water utilities (EPSs) and the
sustainability of investments. It would also target utilities serving key intermediate cities with the aim
of contributing to their economic growth and regional development. More specifically, this operation
would support the revision of management and financing models for sector investments, working
simultaneously with "top-down" (policies and programs) and "bottom-up" (utilities turnaround)
approaches. For that purpose, the project would consist of 3 components, where the first component is
focused on sector reform and implementation, while components 2 and 3 will focus on interventions at
the EPS level. Selection of participating utilities is based on criteria that prioritizes the objectives set
forth in the Modernization law as well as their potential to contribute to regional development.
Performance criteria will be developed for two different typologies of EPSs: i) EPSs subject to
temporary intervention (Regimen de Apoyo Transitorio, RAT) that require an important
transformation; and ii) EPSs currently in compliance with required performance standards but that
require changes in their management models to enhance performance, attend to rapidly changing
urbanization dynamics and contribute to regional growth. EPSs currently considered include:

- Pucallpa - EMAPACOP
- Arequipa - SEDAPAR
- Cusco - SEDACUSCO

Component 1 - Water Sector Policy Reform and Implementation (US$20 million)

This component aims to support national level sector entities. Specifically, this component includes
the following activities:

- Identification, design and implementation of tools to enhance OTASS? operational capabilities
- Development of policies to support sector modernization
Development of business plans for participating utilities to: i) support improvements in capacities and service delivery; ii) support transformation of utilities to play key role in regional economic development
- Enhancing regulation and supervision capacity (SUNASS/OTASS)
- Enhancing inter-institutional coordination (SUNASS/OTASS/MEF/ANA /ANEPSSA )
- Revision of sector financing policies to promote strategic investment in the sector
- Development of integration framework for utilities (aggregation and economies of scale)
- Communication and planning for sector and interventions at EPS level
- Operational management support

Component 2 - Turnaround of utilities (EPSs) (US$30 million)

Operational development
- Demand studies and development of new business models to enhance service delivery to decentralized urban populations, peri-urban and rural
- Demand management programs (to reduce physical and commercial losses)
- Activities to improve service efficiency and citizen engagement
- Catchment management programs and protocols

Management and planning
- Strategic planning, operational improvements (commercial, financial, technical, etc.), citizen engagement and communication, training and capacity building
- Development of financing mechanisms to make water available for productive uses (industrial, agriculture)
- Re-use of wastewater for productive uses to support economic development including revision of legal and regulatory framework
- Improvement of wastewater treatment technology selection and operation and management (O&M) policies to engage the private sector, knowledge transfer and training.

Component 3 - Investments in infrastructure (US$150 million)

- Pre-investment studies (preparation and technical review of ongoing investments)
- Investment in critical bottlenecks in existing infrastructure
- Increasing connectivity to sewerage and sanitation services
- Targeting of investments (expansion and rehabilitation) to promote universal access and social inclusion;
- Protection of water sources

II. SAFEGUARDS

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

Under the scope of component 2 and 3, the project will carry out interventions at EPSs/ municipalities level. The specific EPSs and sub-projects to be considered for inclusion in the program and financing are in the process of selection.

B. Borrowers Institutional Capacity for Safeguard Policies

The Technical Organization for the Administration of WSS services (OTASS) was created by the Modernization Law to provide technical and managerial assistance to urban municipal WSS utilities. OTASS is considered the technical arm for WSS sector within the Housing, Sanitation and
MVCS has experience implementing World Bank social and environmental operational policies in projects such as PRONASAR and other sectors such as Urban, DRM and Transport. As OTASS is a newly formed entity, it does not have experience in applying World Bank environmental operational policies and social operational policies on Involuntary Resettlement and Indigenous People, and does not have dedicated staff for dealing with these issues. Many EPSs have citizen engagement units who have the potential to support the implementation of these policies, but capacity will vary depending on the size of the EPSs. As part of the Bank’s review of the project (project preparation), the institutional capacity related to environmental and social aspects needs will be assessed, including the staff/resource availability or requirements to meet the project requirements.

C. Environmental and Social Safeguards Specialists on the Team

Fabio PittalugaGSU04
Raul TolmosGEN04

D. POLICIES THAT MIGHT APPLY

<table>
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<th>Safeguard Policies</th>
<th>Triggered ?</th>
<th>Explanation (Optional)</th>
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<tr>
<td>Environmental Assessment OP/BP 4.01</td>
<td>Yes</td>
<td>This project is classified as Category B per OP/BP 4.01, as the investments involve relatively standard works with no likely significant or long-term environmental or social impacts and that can be readily prevented or mitigated with standard measures. The potential negative environmental and social impacts associated with the construction works could include erosion or sedimentation due to earth works, operation of work campsites, noise and dust from equipment and earthworks, spills of oil based products, worker health and safety, storm water runoff into water courses, and traffic risks and nuisances. Since the specific location of some investments and associated works is not known, an Environmental and Social Management Framework (ESMF) will be developed. The ESMF will be developed in accordance to the World Bank Group Environmental, Health and Safety Guidelines on Water and Sanitation. Also, during project preparation, as selected investment projects are identified and their</td>
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<tr>
<td>Policy Code</td>
<td>Triggered</td>
<td>Summary</td>
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<tr>
<td>Natural Habitats OP/BP 4.04</td>
<td>Yes</td>
<td>The policy is triggered since protection of water bodies and that catchment management protocols and pilots that may be designed under the project may affect natural habitats. Appropriate screening criteria will be developed as part of the ESMF to ensure that impacts on natural and critical natural habitats are properly evaluated. ESMF will articulate that no sub-projects, which involve the significant conversion of natural habitats will be financed.</td>
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<tr>
<td>Forests OP/BP 4.36</td>
<td>TBD</td>
<td>This policy is considered TBD since the proposed activities under the project may support pilots for catchment management programs might involve forest management. As part of the ESMF, a screening mechanism will be developed to ensure that no sub-projects, which affect the management of forests or the welfare of forest dependent communities be eligible.</td>
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<tr>
<td>Pest Management OP 4.09</td>
<td>No</td>
<td>This policy should not be triggered since the proposed project is not anticipated to result in the use or procurement of pesticides. Minor use of pesticides to control pests in construction areas or in workers’ campsites will addressed in the ESMF.</td>
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<tr>
<td>Physical Cultural Resources OP/BP 4.11</td>
<td>Yes</td>
<td>This policy should be triggered given the national scope of this project and Peru’s widely spread of physical cultural resources. Further surveying of physical cultural resource will be carried out during project preparation and documented in the ESMF. This ESMF will include chance-find procedure.</td>
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<tr>
<td>Indigenous Peoples OP/BP 4.10</td>
<td>Yes</td>
<td>The policy will be triggered given the project’s national scope. An Indigenous</td>
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Peoples Planning Framework (IPPF) will be prepared and consulted at a national level (with representative Indigenous organizations) and disclosed prior to appraisal.

| Involuntary Resettlement OP/BP 4.12 | Yes | Because the project will involve the rehabilitation and potentially the construction of new infrastructure, it is possible that land use may be necessary and that informal users occupying municipal land or the right of way may be displaced. A Resettlement Policy Framework (RPF) should be prepared and disclosed prior to appraisal that focuses specifically on the types of impacts typical to this type of project. Given the range of donors and potential variances in definitions and understanding around resettlement and voluntary vs. involuntary, it will be important to fully assess the impacts and requirements under OP/BP 4.12. The Project may support activities related to the protection of water sources, which may imply the creation or enforcement of protected areas, then it may be necessary to prepare a Process Framework for potential restrictions in access to natural resource use. The necessity for such a framework will be assessed during preparation and if needed will be developed and disclosed prior to Appraisal. |
| Safety of Dams OP/BP 4.37 | No | This policy should not be triggered. The Project will not support the construction or rehabilitation of dams. The potential for sub-projects or project investments to rely on the services of existing dams will be assessed during project preparation. |
| Projects on International Waterways OP/BP 7.50 | No | This policy should not be triggered. Although specific interventions are not yet known, it is anticipated that the project will not intervene or impact international waterways. |
| Projects in Disputed Areas OP/BP 7.60 | No | This policy should not be triggered since the Project will not be implemented in areas under dispute. |

E. SAFEGUARD PREPARATION PLAN

1. Tentative target date for preparing the Appraisal Stage ISDS:
   30-Sep-2016

2. Time frame for launching and completing the safeguard-related studies that may be needed.
The specific studies and their timing should be specified in the Appraisal-stage ISDS. 
4 - 5 months

III. Contact point

World Bank

Contact: Habab Taifour  
Title: Sr Water Resources Mgmt. Spec.  
Contact: Gustavo Saltiel  
Title: Lead Water and Sanitation Spec

Borrower/Client/Recipient

Name: Republic of Peru  
Contact: Gabriela Carrasco  
Title: Director, DGETP  
Email: ecaceres@mef.gob.pe

Implementing Agencies

Name: The Technical Organization for the Administration of WSS services (OTASS)  
Contact: Fernando Laca Barrera  
Title: Executive Director  
Email: fernando.laca@otass.gob.pe

IV. For more information contact:

The World Bank  
1818 H Street, NW  
Washington, D.C. 20433  
Telephone: (202) 473-1000  
Web: http://www.worldbank.org/projects

V. Approval

<table>
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<tr>
<th>Task Team Leader(s):</th>
<th>Name: Habab Taifour, Gustavo Saltiel</th>
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<tr>
<td>Safeguards Advisor: Name: Noreen Beg (SA) Date: 02-Feb-2017</td>
</tr>
<tr>
<td>Practice Manager/Manager: Name: Rita E. Cestti (PMGR) Date: 02-Feb-2017</td>
</tr>
<tr>
<td>Country Director: Name: Alberto Rodriguez (CD) Date: 03-Apr-2017</td>
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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.