I. Project Context

Country Context

Ukraine is a densely populated country of 46 million people, with 68 percent of the population living in urban areas. The country has five cities with a population of over 1 million, another five with a population between 500,000 and 1 million, and some 35 cities that have populations between 100 and 500 thousand. The bulk of the urban population lives in towns of less than 100,000 people. Kiev is the largest city with a population of 2.8 million, followed by Kharkov with 1.5 million people.

The country is emerging from the 2008 economic and financial crisis with serious structural weaknesses. Fiscal imbalances remain significant with large social transfers, inefficient public services, and significant quasi-fiscal subsidies threatening sustainability. The financial sector is fragile and the business climate is persistently ranked among the lowest in the region. Despite an export-led recovery over the past two years, output is below pre-crisis levels, and the economy remains vulnerable to volatile commodity prices and dependent on foreign financing. The public sector is large, but the quality of many public services has been deteriorating. Surveys conducted on
the eve of Ukraine’s 20th anniversary of independence and recent social protests reveal widespread discontent with economic conditions and public governance.

In the face of well-identified social and economic development challenges, successive Ukrainian governments have struggled with implementing reform. Behind many implementation difficulties lie fundamental challenges of economic and political governance. Corruption and state capture have been pervasive and are broadly recognized as a major development constraint.

Over the past decade, Ukraine’s authorities have shied away from undertaking structural reforms, and public trust in the state has been undermined. This, in turn, has created public resistance to necessary but painful reforms of social transfers and public services. Consecutive governments have thus opted for short-term fiscal handouts, which have diminished the fiscal space needed for public investment and weakened the focus on strategic priorities.

Ukraine faces a number of complex challenges as it continues to build its agenda for socially equitable and environmentally responsible economic growth. In 2010, Ukraine adopted a National Environmental Strategy for 2020 and a National Action Plan for 2011-2015 to protect the environment. Some of the major commitments of the Plan are linked to improving urban water supply and wastewater treatment.

**Sectoral and institutional Context**

Over the past 20 years, access to water supply services in Ukraine has stagnated at 80 percent largely due to a lack of investment. In cities and towns, 90 percent of the population is connected to water supply. Some 85 percent of Ukraine's urban residents have access to sewerage, but only 70 percent have access to wastewater treatment. Infrastructure for collecting and treating wastewater is either nonoperational or poorly operated, and the pollution of national and international waterways continues unabated. The Black Sea receives 80 percent of Ukraine’s untreated water-borne waste, with severe environmental and economic consequences.

Relatively high connection rates in urban areas are a deceptive indicator for sector performance, because most utilities are failing to provide safe and reliable services. Investment needs for upgrading the water and sewerage systems are far higher than what can be mobilized by the utilities, consumers, and government. It is estimated that EUR 4-6 billion is needed to bring the water and sanitation systems to operational safety, and a total of EUR 22-26 billion will be required to achieve international service standards.

Decades of underinvestment and poor maintenance have resulted in an asset base that is in dire need of replacement and upgrading. In many areas, water supply is intermittent because service providers have inadequately maintained infrastructure due to cash flow issues. This has created a vicious cycle whereby financial constraints limit investments needed to rehabilitate the sector, which in turn causes losses and inefficiencies within the system that then affect and further compound the financial situation of utilities. For instance, in the last 15 years, average non-revenue water (NRW) rates rose to more than 40 percent of water production, which imposes a significant financial cost on utilities. NRW rates increased due to both physical losses from deteriorating infrastructure that should have long been replaced or rehabilitated, and from commercial losses due to unmetered consumption.
Most utilities are unable to generate adequate revenue to meet operations and maintenance costs due to inefficient operations and low tariffs. According to the Regulator, the average water and wastewater tariff level for both businesses and households in Ukraine is 3.63 UAH/M3 while actual costs (including depreciation of assets) are 5.43 UAH/M3. The Government has estimated that tariffs should increase by on average 43% in order to reach cost recovery levels. Nevertheless, tariffs have continued to remain below utilities’ cost recovery levels due to lack of political will, inadequate sector governance, lack of engagement between consumers and utilities on the necessity to increase tariff levels, and a sense of distrust among consumers that an increase in tariffs will be accompanied by improvements in services.

As a result, utilities are heavily dependent on government transfers to meet operating and maintenance costs. The central government subsidies however, are often delayed, and whenever utilities have extra funds available, or receive the delayed subsidy, they do not invest in rehabilitation, but use available funds to pay the state-owned energy company on arrears. This situation has resulted in inefficient service delivery, poor infrastructure maintenance, and overall underinvestment in the sector.

The problems have been exacerbated in recent years with the sharp rise in real terms of electricity tariffs, given the energy intensive systems required for water production and wastewater treatment. Approximately 30% of utilities’ operations and maintenance expenses are tied to energy costs. This is a result of rising energy tariffs, but is also due to inadequate upkeep and investments in infrastructure that has led to inefficient use of assets and their need for greater energy consumption.

Sector governance is weak and fragmented. Out of more than 6,000 water supply and sanitation utilities, 1,857 provide services to the urban population. The ownership structures of these water utilities (vodokanals) ranges from communal utilities (owned by the municipalities, and accounting for 83 percent of the total number of utilities), state utilities, and private utilities. Due to the lack of cost recovery in the sector, most utilities are not creditworthy and cannot borrow from financial markets. The National Commission for Regulation of Communal Services (the “Regulator”) was established in 2011 to: (i) improve cost recovery through centralized tariff setting; (ii) establish national service standards; (iii) improve governance of the utility sector; and (iv) strengthen reporting requirements.

In summary, the urban water supply and wastewater sector context is characterized by stagnated and deteriorating access, inadequate levels of services, inefficiency, unabated environmental impacts, and unsustainable financial operations, with weak and fragmented governance. The sector requires reforms that will allow utilities to recover their costs and invest in maintenance and rehabilitation as a means to provide consumers with better services while also decreasing the environmental degradation. Overall, sector performance would benefit from an approach that focuses on: (i) improving operational and energy efficiency that can help lower the cost of providing services; (ii) adjusting tariff levels and structures; and (iii) reducing environmental degradation.

Investments are critical to support the transition to sustainable service provision. Without replacement and upgrading of infrastructure, the services that are provided to customers will continue to deteriorate, where non-revenue water losses escalate and emergency maintenance will increase as a result of system and equipment failures, and hence operation and maintenance costs will escalate. Even more important, as is currently also happening in Zhytomyr, the utilities will not
be able to provide continuous water supply to part of its customers. Low service quality will also make customers increasingly unwilling to pay for such services, and will make it very difficult to increase the tariffs as one of the tools to improve sector performance.

To support improvements in sector performance, the World Bank approved an Urban Infrastructure Project (UIP) in 2007 that focused on two main priorities: (i) energy efficiency; and (ii) improving the quality of urban water supply and wastewater services. Investments in energy efficiency in thirteen utilities under the UIP are expected to reduce total energy consumption of participating utilities by 15 percent, translating to significant reductions in greenhouse gas emissions. UIP is also contributing to sector reform by increasing institutional capacity and strengthening the accountability and efficiency of water utilities. In order to continue the implementation of both the environmental and governance reform agendas, the Government of Ukraine requested a follow-up project to build upon momentum created through UIP.

Solid waste collection services suffer from limited operational capacity, but also from an underdeveloped landfill infrastructure. In 2010, it was estimated that some 12 million metric tons of municipal solid waste was generated in Ukraine. The solid waste generation rates have increased significantly since the year 2000 and projections indicate that the existing operational capacity of the processing infrastructure and equipment will need to be doubled by 2025 in order to meet demands. Many municipalities rank solid waste as one of their most urgent priorities. The situation in the sector is further complicated by low user fees, which makes cost recovery difficult. The current cost recovery rate is only between 5 and 7 percent (compared to 40 percent in the US). The estimated volume of investment needed in the sector is approximately EUR13 billion.

The key focus areas for the solid waste sector are the dire need of improving the quality and efficiency of services, preparing plans for expansion of the rapidly diminishing disposal space, and enhancing public awareness and participation. The World Bank’s Solid Waste Assessment Study in Ukraine (2013) highlights the following key issues: (i) it finds a rather unstable investment climate for the private sector; (ii) low tariffs translate into a lack of capital for investment in high quality infrastructure that meets environmental standards for landfills; (iii) there is a lack of waste separation that results in an unnecessarily high volume of waste being dispatched to landfills; and (iv) the recently passed national legislation reduces the authority of municipalities and creates a confusing institutional framework with regard to responsibilities at the national level.

II. Proposed Development Objectives

The project development objective (PDO) is to improve the quality, efficiency and sustainability of water, wastewater, and solid waste services in selected cities in Ukraine. This will be achieved through rehabilitation and reconstruction of WSS infrastructure in at least eight cities. The project will also support improvements in sustainable service delivery through the utilities performance improvement program.

III. Project Description

Component Name
Component 1: Urban Infrastructure Improvement

Comments (optional)
This component will finance rehabilitation and upgrading of priority infrastructure for water, wastewater and solid waste services in selected cities
Component Name
Component 2: Institutional Strengthening and Capacity Building

Comments (optional)
This component will provide institutional strengthening and capacity building support at central Government and sub-national levels

Component Name
Component 3: Project Management and Supervision

Comments (optional)
Involves support for management and supervision of the project

IV. Financing (in USD Million)

<table>
<thead>
<tr>
<th>Financial Category</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Project Cost</td>
<td>350.00</td>
</tr>
<tr>
<td>Total Bank Financing</td>
<td>300.00</td>
</tr>
<tr>
<td>Financing Gap</td>
<td>0.00</td>
</tr>
</tbody>
</table>

For Loans/Credits/Others

<table>
<thead>
<tr>
<th>Borrower</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>International Bank for Reconstruction and Development</td>
<td>300.00</td>
</tr>
<tr>
<td>Clean Technology Fund</td>
<td>50.00</td>
</tr>
<tr>
<td>Total</td>
<td>350.00</td>
</tr>
</tbody>
</table>

V. Implementation

Overall responsibility for project implementation lies with the Minregion which houses CPMU to oversee UIP2. The CPMU was established under the first UIP project in 2008. The proposed management structure for the project incorporates lessons learned during implementation of the ongoing UIP project. It continues the CPMU model, also regional PMUs are already established. Consultants and individual experts financed under the loan would support the CPMU, as needed, to ensure appropriate fiduciary arrangements and independent audits and to provide the necessary training.

Each participating utility will have a RPMUs that will manage project implementation activities. The utilities, in full coordination with Minregion, will be responsible for procurement, contract management, financial management (FM), disbursement, safeguards, and monitoring and evaluation. Consultants may be engaged to provide technical support as needed to RPMUs.

The CPMU will continue to be responsible for overall project coordination and reporting including monitoring compliance with safeguards, fiduciary, legal and other covenants. It is envisaged that the CPMU will take the lead on sector reform and institutional strengthening activities under Component 2.

A Project Operational Manual (POM) describing all work related to procurement, financial management, disbursement, monitoring and implementation arrangements will be prepared by effectiveness in conformity with the ongoing UIP POM.

VI. Safeguard Policies (including public consultation)

<table>
<thead>
<tr>
<th>Safeguard Policies Triggered by the Project</th>
<th>Yes</th>
<th>No</th>
</tr>
</thead>
<tbody>
<tr>
<td>Environmental Assessment OP/BP 4.01</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>------------------------------------</td>
<td>---</td>
<td></td>
</tr>
<tr>
<td>Natural Habitats OP/BP 4.04</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Forests OP/BP 4.36</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Pest Management OP 4.09</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Physical Cultural Resources OP/BP 4.11</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Indigenous Peoples OP/BP 4.10</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Involuntary Resettlement OP/BP 4.12</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Safety of Dams OP/BP 4.37</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Projects on International Waterways OP/BP 7.50</td>
<td>✗</td>
<td></td>
</tr>
<tr>
<td>Projects in Disputed Areas OP/BP 7.60</td>
<td>✗</td>
<td></td>
</tr>
</tbody>
</table>

Comments (optional)

VII. Contact point

**World Bank**

Contact: Sana Kh.H. Agha Al Nimer  
Title: Sr Water & Sanitation Spec.  
Tel: 473-2207  
Email: saghaalnimer@worldbank.org

**Borrower/Client/Recipient**

Name: Ministry of Finance  
Contact: Viktoria Kolosova  
Title: Head, Division for Cooperation with International Finance Or  
Tel: 38044 2775333  
Email: kolosova@minfin.gov.ua

**Implementing Agencies**

Name: Participating Utilities  
Contact:  
Title:  
Tel:  
Email:  

VIII. For more information contact:

The InfoShop  
The World Bank  
1818 H Street, NW  
Washington, D.C. 20433  
Telephone: (202) 458-4500  
Fax: (202) 522-1500  
Web: http://www.worldbank.org/infoshop