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INTERNATIONAL BANK FOR RECONSTRUCTION AND DEVELOPMENT
PROGRAM APPRAISAL DOCUMENT
ON A
PROPOSED LOAN
IN THE AMOUNT US\$550 MILLION
TO THE
ARAB REPUBLIC OF EGYPT
FOR A
SUSTAINABLE RURAL SANITATION SERVICES PROGRAM FOR RESULTS

July 8, 2015

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CURRENCY EQUIVALENTS

(Exchange Rate as of July 8, 2015)

Currency Unit	Egyptian Pound
LE 1	US\$ 0.13
US\$ 1	LE 7.83

FISCAL YEAR

JANUARY 1 -DECEMBER 31

ABBREVIATIONS AND ACRONYMS

AIR	Annual Information Report
APA	Annual Performance Assessment
BD	Bidding Document
BP	Bank Policy
CAO	Central Auditing Organization
CAPMAS	Central Agency for Public Mobilization and Statistics
CAPWO	Cairo and Alexandria Potable Water Organization
CDA	Community Development Association
CPAR	Country Procurement Assessment Review
CPF	Country Partnership Framework
CPGA	Contracts & Procurement General Administration
CPI	Consumer Price Index
CSO	Civil Society Organization
DLI	Disbursement Linked Indicators
DLR	Disbursement Linked Results
EBRD	European Bank for Reconstruction and Development
ESSA	Environmental and Social Systems Assessment
ESW	Economic Sector Work
EU	European Union
EWRA	Egyptian Water Regulatory Agency
FOPIP	Financial and Operational Performance Improvement Programme
FSA	Fiduciary Systems Assessment
GAGS	General Authority of Government Services
GDP	Gross Domestic Product
GIS	Geographic Information Systems
GIZ	German International Development Organization
GoE	Government of Egypt
GPS	Global Positioning Systems
GRM	Grievance Redress Mechanism
HCWW	Holding Company for Water and Wastewater
IPF	Investment Project Financing
ISC	Implementation Support Consultant
ISSIP	Integrated Sanitation and Sewerage Infrastructure Project
IVA	Independent Verification Agent
IWSP	Improved Water and Wastewater Services Program
JICA	Japan International Cooperation Agency

KfW	German Development Bank
KM	Knowledge Management
KPI	Key performance Indicator
M&E	Monitoring and Evaluation
MARS	Monitoring, Analysis and Reporting System
MENA	Middle East and North Africa Region
MHUUC	Ministry of Housing, Utilities and Urban Communities
MoF	Ministry of Finance
MoIC	Ministry of International Cooperation
MoLD	Ministry of Local Development
MoU	Memorandum of Understanding
MR	Minimum Requirements
NGO	Non-Governmental Organization
NOPWASD	National Organization for Potable Water and Sanitary Drainage
NRSP	National Rural Sanitation Program
O&M	Operation and Maintenance
OECD	Organization for Economic Co-operation and Development
PAP	Program Action Plan
PBCG	Performance-Based Capital Grant
PDO	Program Development Objective
PER	Public Expenditure Review
PforR	Program for Results
PG	Performance Grant
PIAP	Performance Improvement Action Plan
PMC	Program Management Consultant
PMCF	Program Management Consultant Firm
PMU	Program Management Unit
POM	Program Operations Manual
PPM	Procurement Procedures Manual
PS	Pumping Station
SBD	Standard Bidding Document
SOE	State Owned Enterprise
SOP	Standard Operating Procedure
TA	Technical Assistance
TOR	Terms of Reference
USAID	United States Agency for International Development
WDR	World Development Report
WSC	Water and Sanitation Company
WSP	Water and Sanitation Program
WWTP	Wastewater Treatment Plant

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Task Team Leader	Gustavo Saltiel
Co-Task Team Leader	Osama Hamad
Co-Task Team Leader	Genevieve Connors

ARAB REPUBLIC OF EGYPT

SUSTAINABLE RURAL SANITATION SERVICES PROGRAM FOR RESULTS

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PAD DATA SHEET

Arab Republic of Egypt

Sustainable Rural Sanitation Services Program for Results

PROGRAM APPRAISAL DOCUMENT

*Middle East and North Africa Region
Water Global Practice*

Basic Information

Date:	July 8, 2015	Sectors:	Sanitation Wastewater & Disposal Sub-national Government Administration Health
Country Director:	Asad Alam	Themes:	Pollution management and environment Health Gender Rural and infrastructure Water resource management
Practice Manager/Senior Global Practice Director:	Steven N. Schonberger/Junaid Kamal Ahmad		
Program ID:	P154112		
Team Leader(s):	Gustavo Saltiel Osama Hamad Genevieve Connors		
Program Implementation Period:	Start Date: July 28, 2015	End Date:	September 30, 2020
Expected Financing Effectiveness Date:	December 30, 2015		
Expected Financing Closing Date:	October 31, 2020		

Program Financing Data									
<input checked="" type="checkbox"/> Loan		<input type="checkbox"/> Grant			<input type="checkbox"/> Other				
<input type="checkbox"/> Credit									
For Loans/Credits/Others (US\$M):									
Total Program Cost		US\$1.25 billion			Total Bank Financing :		US\$550 million		
Donors' Contribution/Borrower's Contribution:		US\$700 million			Financing Gap: N/A				
Financing Source for the Entire Program					Amount				
BORROWER					US\$170 million				
IBRD					US\$550 million				
OTHER DONORS CONTRIBUTION					US\$530 million				
TOTAL					US\$1.25 billion				
Borrower: Arab Republic of Egypt									
Responsible Agency: Ministry of Housing, Utilities and Urban Communities (MHUUC)									
Contact:		Dr. Sayed Ismail			Title: Minister's Advisor				
Telephone No.:		20-109 4335561			Email: Sayed_Ismail@moh.gov.eg				
Expected Disbursements (in USD Million)									
Fiscal Year	2016	2017	2018	2019	2020	2021			
Annual	21.38	38.00	141.07	109	110.5	130.05			

Cumulative	21.38	59.38	200.45	309.45	419.95	550.00				
Program Development Objective(s)										
To strengthen institutions and policies for increasing access and improving rural sanitation services in the Governorates of <i>Beheira</i> , <i>Dakahliya</i> , and <i>Sharkiya</i> in Egypt.										
Compliance										
Policy										
Does the program depart from the CAS in content or in other significant respects?						Yes []		No [X]		
Does the program require any waivers of Bank policies applicable to Program-for-Results operations?						Yes []		No [X]		
Have these been approved by Bank management?						Yes []		No []		
Is approval for any policy waiver sought from the Board?						Yes []		No [X]		
Does the program meet the Regional criteria for readiness for implementation?						Yes [X]		No []		
Overall Risk Rating: Substantial										
Legal Covenants										
Name: Legal Agreement Schedule 2 Section I. (A)				Recurrent	Due Date			Frequency		
Implementation Arrangements				X						
Description of Covenant: The Borrower, through MHUUC, shall carry out and shall cause the Program to be carried out by the Program Implementing Entities, in accordance with financial management, procurement and environmental and social management systems acceptable to the Bank.										
Name: Legal Agreement Schedule 2 Section I. (B)				Recurrent	Due Date			Frequency		
Anti-Corruption				X						
Description of Covenant: The Borrower, through MHUUC, shall carry out, and shall cause the Program Implementing Entities to carry out the Program, in accordance with the provisions of the Anti-Corruption Guidelines.										

Name: Legal Agreement Schedule 2 Section I. (C) (1)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements	X		
Description of Covenant: The Borrower shall carry out and shall cause the Program Implementing Entities to carry out the Action Plan, in accordance with the time schedule set out in such Action Plan in a manner acceptable to the Bank. The Borrower, through MHUUC, and the Program Implementing Entities shall ensure that the Action Plan is not amended, waived, suspended, terminated or abrogated, by the Program Implementing Entities.			
Name: Legal Agreement Schedule 2 Section I. (C) (2) (a)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements	X		
Description of Covenant: The Borrower through MHUUC shall maintain the PMU with terms of reference, powers, functions and resources, acceptable to the Bank, and with composition of staff in sufficient numbers and adequate qualifications to carry out its responsibilities under the program.			
Name: Legal Agreement Schedule 2 Section I. (C) (2)(b)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements		3 months after Effectiveness Date	
Description of Covenant: The Borrower shall, through MHUUC, no later than three months after the Effectiveness Date, hire and thereafter retain a consultant firm with terms of reference acceptable to the Bank to provide support to the PMU in management and coordination of the Program, including the planning of projects and activities under the NRSP and the Program, project management, supervision of engineering works, assistance in procurement processes, and quality assurance relating to the overall implementation of the Program.			
Name: Legal Agreement Schedule 2 Section I. (C) (3)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements	X		
Description of Covenant: The Borrower shall, through MHUUC and with the assistance of the PMU, carry out its respective activities under Part C of the Program, and the Program Implementing Entities shall carry out their respective activities under the Program, in accordance with the provisions of the Program Operations Manual and a time frame acceptable to the Bank. The Borrower and the Program Implementing Entities shall not amend, waive, suspend, terminate or abrogate the Program Operations Manual or any provision thereof.			
Name: Legal Agreement Schedule 2 Section I. (C) (5)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements	X		
Description of Covenant: The Borrower shall, through MHUUC, take all actions as may be needed in order to enable HCWW to implement its respective activities under the Program and to fulfil its obligations under the Program Agreement. HCWW shall take all actions as needed to enable the WSCs to implement their respective activities under the Program.			

Name: Legal Agreement Schedule 2 Section I. (C) (6)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements	X		
Description of Covenant: The Borrower shall provide each fiscal year a Performance-based Capital Grant to each WSC for the purpose of carrying out its Annual Capital Investment Plan.			
Name: Legal Agreement Schedule 2 Section I. (C) (7)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements	X		
Description of Covenant: The Borrower shall, through MHUUC cause the PMU with the collaboration of HCWW, to evaluate the achievement of the Minimum Requirements and to carry out Annual Performance Assessment of the WSCs under their respective Performance Improvement Action Plan, all in accordance with principles, methodology and arrangements set out in the Program Operations Manual.			
Name: Legal Agreement Schedule 2 Section I. (C) (8)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements		June 30, 2016	
Description of Covenant: The Borrower and the Program Implementing Entities shall, no later than June 30, 2016, establish, a complaints and grievance redressal mechanism to handle complaints and grievances from Program beneficiaries or third parties relating to any aspects of the Program including adverse social and environmental impacts, and allegations of fraud and corruption.			
Name: Legal Agreement Schedule 2 Section I. (C) (9)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements		3 months after Effectiveness Date	
Description of Covenant: The Borrower shall, no later than three months after the Effectiveness Date, engage an Independent Verification Agent, to prepare and provide verification reports certifying the achievement of the DLRs, all in accordance with procedures and arrangements acceptable to the Bank.			
Name: Legal Agreement Schedule 2 Section I. (C) (10)	Recurrent	Due Date	Frequency
Other Program Institutional and Implementation Arrangements	X		
Description of Covenant: To facilitate the carrying out of the Program, the Borrower shall, through MHUUC, make the proceeds of the loan available to the Program Implementing Entities in a timely manner.			
Legal Agreement Schedule 2 Section II. (A) and (B)	Recurrent	Due Date	Frequency
Excluded Activities	X		
Description of Covenant: The Borrower shall, through MHUUC, ensure that the Program excludes any activities which: (A) are likely to have significant adverse impacts that are sensitive, diverse, or unprecedented on the environment and/or affected people; or (B) involve the procurement of: (1) works, estimated to cost US\$50 million equivalent or more per contract; (2) goods, estimated to cost US\$30 million equivalent or more per contract; (3) non-consulting services, estimated to cost US\$20 million equivalent or more per contract; or (4) consultants' services, estimated to cost US\$15 million equivalent or more per contract.			

Name: Program Agreement Section I. (C) (7)	Recurrent	Due Date	Frequency
Other Program Implementation Arrangements	X		
Description of Covenant: The WSCs shall each year take action to achieve the Minimum Requirements, and prepare and implement a Performance Improvement Action Plan.			

Team Composition			
Bank Staff			
Name	Title	Specialization	Unit
Gustavo Saltiel	Program Manager	Task Team Leader	GWADR
Genevieve Connors	Sr. Water Resources Specialist	Co-Task Team Leader	SACIN
Osama Hamad	Sr. Water Resources Management Specialist	Co-Task Team Leader	GWADR
Rama Krishnan Venkateswaran	Lead Financial Management Specialist	Institutional Development	GGODR
Yogita Mumssen	Sr. Infrastructure Economist	Senior Infrastructure Economist	GWADR
Badr Kamel	Sr. Procurement Specialist	Procurement Specialist	GGODR
Mohamed Yahia Ahmed Said Abd El Karim	Sr. Financial Management Specialist	Financial Management Specialist	GGODR
Africa Eshogba Olojoba	Lead Environmental Specialist	Environmental Specialist	GENDR
Alaa Ahmed Sarhan	Senior Environmental Economist	Environmental Economist	GENDR
Sally Zgheib	Water Supply & Sanitation Specialist	Technical support	GWADR
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Balakrishna Menon Parameswaran	Program Leader	Program Leader	MNC03
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Fatiha Amar	Program Assistant	Operational Support	GWADR
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Luis R. Prada Villalobos	Sr. Procurement Specialist	Procurement Specialist	GGODR
Maged Mahmoud Hamed	Regional Safeguards Advisor	Safeguards Adviser	OPSOR
Mohammad Farouk Ibrahim Kandeel	Consultant	Safeguards Specialist	GTCDR
Mouhamed Fadel Ndaw	Sr. Water & Sanitation Specialist	Sr. Water & Sanitation Specialist	GWASA
Norhan Mohamed Sadik	Temporary	Research Assistant	GWADR
Regassa Ensermu Namara	Sr. Water Resources Economist	Team Economist	GWADR
Victoria Gyllerup	Sr. Operations Officer	Sr. Operations Officer	GWADR

Mariana T. Felicio	Social Development Specialist	Citizen Engagement	GSURR
Syed I. Ahmed	Lead Counsel	Lead Counsel	LEGAM
Mei Wang	Senior Counsel	Legal	LEGAM
Non-Bank Staff			
Name	Title	City	
Ben de Ru	Engineer/Financial Management Specialist/Project Manager	Amsterdam	
Sixto Requena	Financial Engineering	Washington, D.C.	
Eric Buhl	Financial Specialist	Copenhagen	

I. STRATEGIC CONTEXT

A. Country Context

1. ***The Government of Egypt (GoE) is taking steps towards more citizen-responsive approaches to service delivery.*** While ongoing concerns regarding social stability condition the political decentralization process, the GoE has recognized the importance of demonstrating enhanced state-responsiveness through key service-delivery mechanisms. The GoE has highlighted its intention to increase governorate-level accountability for basic services such as water, sanitation and solid waste in order to bring responsibility for these services closer to the citizenry, as demonstrated for example by the Local Administrative Law which is currently being drafted and is under consideration. By increasing the responsibility of corporatized entities, such as governorate-level Water and Sanitation Companies (WSCs) for the quality of services, it is de-politicizing the engagement with customers, and therefore creating greater space for the use of direct client feedback tools such as citizen report cards. At the same time, there is a gradual opening to engage with some service-oriented civil society groups to partner in the actual delivery of basic services, such as rural sanitation, and therefore to gain from their close engagement with communities and scope for innovation. Finally, the establishment of institutions of transparency in service delivery performance, such as more independent regulators, is now moving forward in key sectors such as water supply and sanitation, which will provide both citizens and Government with the basis for comparing the effectiveness of service providers. These improvements are being carried out selectively, gradually and on a pilot basis, and represent an important opportunity to demonstrate the value – in terms of building a more stable and prosperous state - of moving from a uni-directional service approach which “grants” services to the populace, to one which engages the citizenry in a common agenda of improving quality of life through improved basic services.

2. ***Egypt will also need to continue addressing the needs of the poor, the most vulnerable, and disaffected groups, with a strong focus on rural Egypt.*** Regional and rural-urban welfare disparities are an enduring feature of poverty in Egypt. Poverty has been consistently highest in Upper Rural Egypt, which accounts for a quarter of the population, but over half of the country’s poor are in Lower Rural Egypt. The poorest 40 percent of Egyptian households is concentrated in rural regions where coverage rates in education, health, water, waste disposal, and sanitation are below national averages, and the current public spending structure is exacerbating inequities. Child malnutrition, for example, which includes stunting and is linked to inadequate sanitation, has worsened throughout the country and is particularly worrisome in rural areas where it creates an additional burden on women.

3. ***Egypt’s stability also depends on sustained economic progress. Economic activity grew by 4.3 percent in the first half of FY15, the highest rate since the financial crisis, against the backdrop of improved sentiment, a rebound in tourism, and base effect.*** This followed stronger economic activity in the third and fourth quarter of FY14, which grew by 2.5 percent and 3.7 percent respectively, compared to 1.2 percent in the first half of FY14. Growth is further expected to reach around 4.2 percent in FY15, almost double the pace of growth during the previous 4 fiscal years. Egypt has benefitted from large scale financial support from the Arab Gulf Countries,¹ which allowed authorities to jumpstart the economy by embarking on stimulus spending worth

¹ It is estimated that as of December 2014, financial commitment to Egypt from the Gulf Arab countries—Saudi Arabia, the United Arab Emirates (UAE), and Kuwait is around US\$24 billion.

three percent of Gross Domestic Product (GDP) in FY14, lowering the cost of borrowing by 400 basis points in FY14, and increasing foreign reserves. The GoE is striving for a stronger economic recovery to help establish stability ahead of the forthcoming Parliamentary elections (date to be determined).²

4. ***The GoE has undertaken certain economic reforms to underpin overall economic growth.*** In 2014, the GoE increased and/or enacted new taxes, such as the introduction of a long delayed real estate tax, a tax on dividends, in addition to a tax on civil servants' bonuses and increasing taxes on alcohol beverages and tobacco. On the expenditures side, streamlining regressive electricity and fuel subsidies with notable price adjustments were introduced in July 2014, followed by the issuance of a decree detailing electricity tariff and annual increases for all users for the coming five years. These measures, among other factors, have contributed to an expected decline of the budget deficit to 11.3-11.5 percent of GDP in FY15, compared to a preliminary figure of 12.8 percent in FY14, and 13.7 percent of GDP in FY13. They also contributed to the recent upgrade of Egypt's sovereign rating and are expected to generate fiscal savings of LE 80 billion (3.5 percent of FY15 projected GDP), part of which was directed to the health and education sectors (to gradually comply with the new constitutional mandates), as well as to enhancing social safety nets. Internal market reforms are also being implemented to help partially address structural supply bottlenecks, and to help contain inflationary pressures.

5. ***However, key macroeconomic and social risks remain in building and sustaining a broad-based and inclusive economic recovery.*** The official unemployment rate reached 12.8 percent in the third quarter of FY15 (January-March 2015), up from 8.9 percent in the same quarter of 2010. Out of the 3.6 million currently unemployed persons, some 64 percent are between 15 and 29 years old, making youth unemployment the main challenge for economic inclusion and stability. Unemployment rates among males and females stand at 9.2 percent and 24.5 percent, respectively. Urban areas recorded a higher unemployment rate (16 percent) than rural areas (10.9 percent). The latest poverty data indicate that 26.3 percent of the population was living below the national poverty line in FY13.

6. ***Egypt is using its partnership with the World Bank to strengthen the performance of its institutional approach to service delivery in the context of its priority programs for the poor.*** The Government has committed to rapid implementation of visible benefits to the population – and in particular to the poor – through a set of *Presidential Programs* which are directly monitored by the President's Office. These include Rural Sanitation, Housing and Agricultural Land Reclamation. Recognizing that current highly centralized implementation approaches have routinely failed to produce tangible results in an efficient manner, the Government has turned to the World Bank to support the design and implementation of these key programs. As the Bank has identified existing organizations as a major impediment to deliver results and strengthen the local institutions, the Program for Results (PforR) is considered an important instrument to leverage high-level political support required by these initiatives and to materialize the potential for citizens to hold their own government accountable for delivery of results.

² "The Financial Monthly", Ministry of Finance, December 2014.

B. Sector and Institutional Context

7. ***Egypt has experienced uneven access to improved drinking water and sanitation services, especially demonstrated through the urban-rural divide.*** In the past two decades, Egypt has made significant progress in providing direct access to safe, piped drinking water at the household level (from 39 percent to 93 percent) and basic sanitation services through traditional septic tanks (from 52 percent to 93 percent).³ However, access to improved services is still uneven and stark geographical and socioeconomic disparities persist that affect the living conditions and health of millions of Egyptians, including the significant number of children exposed to unsanitary environmental conditions. An estimated 89 percent of households in urban areas are covered by public sewers compared to only 12 percent in rural areas, where 42 million people are underserved and are often faced with overflowing sewage from traditional septic tanks. Only six percent of Egyptian villages are provided with wastewater treatment as a service. Children in rural households are 8.5 times more likely than their urban peers to have no toilet facilities, and nearly 10 percent of households in rural areas use toilet facilities shared among multiple households.

8. ***The sanitation situation is of particular concern in the rural areas of the Nile Delta due to high population density, shallow groundwater levels, and the discharge of untreated sewage directly into the water system.*** With increased household water use resulting from household water supply connections, the traditional *bayaras* (sanitation trenches used as septic tanks) are failing, particularly in the Nile Delta, where the water table is high and soil has low percolation. As a result, the sewage overflows into the streets, and in some areas has undermined building foundations, resulting in the collapse of houses. To prevent the overflow, households must clean their *bayaras* frequently (up to once a week), and pay up to LE 250 every month to have them emptied, which in many cases largely exceeds the costs that households would pay for conventional sanitation solutions, and is unaffordable for the rural poor. Moreover, the rural poor in Lower Egypt pay monthly costs of up to twice the amount paid in Upper Egypt. A household survey carried out in Beheira Governorate revealed that 25 percent of septic-emptying services dispose of their collected wastewater directly into the agricultural drains. As a result of the high water table and the discharge of untreated wastewater, Egypt's scarce freshwater resources are increasingly polluted, putting the health of millions at risk.

9. ***Despite significant Government and donor financing for rural sanitation service improvements, progress has been far below expectations.*** Since 2007, investments totaling LE 32.4 billion (US\$4.6 billion) have been directed at sanitation infrastructure – in particular sewerage networks and Wastewater Treatment Plants (WWTP). While these investments have made some progress, they have generally suffered from: (i) very slow implementation; (ii) inflated construction costs and poor quality; (iii) poor coordination between major infrastructure such as WWTP and local network connections; and (iv) use of technologies that result in high Operation and Maintenance (O&M) costs relative to service needs.

10. ***The separation of institutional responsibilities for investment planning and implementation from operation and maintenance has been a major contributor to the sector's poor performance.*** Currently, the responsibility for works planning and implementation of infrastructure investments is under the National Organization for Potable Water and Sanitary

³ Egypt Network for Integrated Development: Rural Sanitation in Egypt, Policy Brief 010 (2013); [4http://enid.org.eg/Uploads/PDF/PB10_rural_sanitation.pdf](http://enid.org.eg/Uploads/PDF/PB10_rural_sanitation.pdf)

Drainage (NOPWASD), and the operation and management of assets, including billing and collection arrangements, is performed by individual and governorate-based local WSCs. This has often resulted in an inappropriate choice of investment projects, with little attention paid to the maintenance and institutional aspects of services, as well as poor accountability on the part of the WSCs in terms of utilizing these investments to enhance the quality and efficiency of sanitation services. This has limited the ability of the WSCs to be responsive to citizens' demands. Currently, infrastructure investments in the sector are included in the Five Year Plans and are financed out of sector budget allocations in the Annual Budget. The mode of financing is based on estimated requirements for specific investment projects and do not match the actual requirements of WSCs in terms of their capital investment and service delivery needs. Moreover, the financing tends to be ad-hoc and unpredictable, as a result of which the WSCs are not in a position to reliably plan and implement capital investment projects. The costs of inefficiencies in the wastewater sector have been estimated at LE 7.1 billion (ca. US\$1 billion) per year. The fiscal transfers to cover operating inefficiencies, low revenues, and financing operation and maintenance costs represent 1.25 percent of GDP (2007).⁴ Institutionally, the WSCs are beholden to the central level organizations from which they have inherited assets that they must manage and maintain with low prices and insufficient subsidies, and the resulting deterioration of the assets and quality of the services provided.

11. ***A key impediment to improved services in the sector has been the weak accountability to customers.*** Global experience with the provision of water and sanitation services in urban and rural contexts has highlighted the importance of customer accountability in driving service improvements. Under both public and privately managed approaches, the factors determining the effectiveness of service provision are: (i) sufficient autonomy of the service provider to undertake necessary investment and operational decisions to meet service needs, (ii) tariff structures which, while protecting the basic needs of the poor, are sufficient to provide the bulk of revenues and therefore directly link payments to services provided; (iii) aligning any government (central or local) transfers to the service provider to well-defined performance criteria; (iv) direct mechanisms for engaging customers in the improvement of services through feedback mechanisms, such as citizen report cards and direct partnerships with communities in the provision of services – particularly in rural areas; and (v) provision of verifiable performance information to the public as a basis for determining comparative, overall performance and improvements. These factors have, for the most part, been weak or absent in the context of Egypt's approach to the provision of water and sanitation services.

12. ***Low water and wastewater tariffs have jeopardized the financial sustainability of the sector and have an impact on the performance of the WSCs.*** Cairo water tariffs are among the lowest in the world even when compared to other mega-cities of developing countries. Sewage is charged as a percentage of the water bill and remains very low at 25 percent. Water and sanitation operations and investments are funded entirely through the Government budget. The Ministry of Finance (MoF) provides budget allocations to the Ministry of Housing, Utilities and Urban Communities (MHUUC) for operating subsidies and infrastructure development grants. Between 2006 and 2009, the Government provided LE 1.8 billion in subsidies to support WSCs with operational costs. Low tariffs and inadequate financial incentives for reducing operational and maintenance costs and capital expenditures impede the financial sustainability of the WSCs'

⁴ "Water Supply and Wastewater Sector: Improving the Performance of Service Providers." World Bank, 2010.

services. The sporadic tariff increases implemented since 2004 have been marginal, on a very low base.

13. ***Insufficient formal mechanisms for assessing quality of service in the water and sanitation sector have further sustained the poor performance of the sector.*** The Egyptian Water Regulatory Authority (EWRA) has only recently been gaining autonomy to gather and consolidate information on WSC performance, and there is limited, systematic reporting on sectoral and institutional performance to the public. While WSCs generally have customer complaint lines regarding specific concerns of service cuts, etc., there are no regular means, such as customer report cards, for gathering the broader feedback of customers regarding their satisfaction with water and sanitation services.

14. ***Partnerships with communities and civil society groups in meeting service needs have been ad hoc.*** A number of Egyptian and international civil society groups, as well as donors such as the German International Development Organization (GIZ), have developed and piloted innovative, community-based approaches to improving water and sanitation services, particularly in more isolated, rural communities. These experiences have shown considerable scope for meeting needs more rapidly and at lower cost than conventional service extension approaches. However, as neither the WSCs nor the central agencies have developed a systematic approach for partnering with communities and Civil Society Organizations (CSOs), there has been little diffusion or scale-up of these experiences as part of the effort to accelerate rural sanitation service coverage nationally. Additionally, the lack of local community partners (including Non-Governmental Organizations (NGOs) and CSOs) has further limited the impact of the few successful experiences.

15. ***Efforts to decrease centralization had been initiated in the past, but these need to be taken further and performance measures need to be introduced in order for the local WSCs to be better equipped and incentivized to deliver improved services.*** The Government, with support from USAID and other partners, developed an institutional road map in 2004, which consolidated most of the water and wastewater service providers under a Holding Company for Water and Wastewater (HCWW) with the intention of corporatizing the local WSCs under it as individually accountable utilities. However, the process was stalled prior to initiating a gradual shift of responsibility for planning and implementing infrastructure development from centralized construction agencies to the individual WSCs. The Technical Assessment undertaken to inform the design of the Bank-financed Program indicates that the reform process initiated in 2004 has led to some improvements: Key Performance Indicators (KPIs) show that the performance of WSCs is generally good, and that there have been significant strides in operational performance. However, areas such as contract management, procurement and citizen engagement have to date been weak and need to be strengthened. With institutional improvements taken a step further, and with clear performance-based incentives and related capacity support, the assessment is positive about improved service delivery through empowered WSCs.

16. ***The Government recognizes the urgency of these challenges and is pursuing important institutional changes for greater access and inclusivity of basic services and to address critical needs of poor communities, an approach reflected in the National Rural Sanitation Program (NRSP).*** The NRSP aims to provide universal access to rural sanitation services and to reinforce a series of performance improvement measures at the local utility level, supported by national initiatives to address persistent sector challenges such as low cost recovery. The NRSP sets out to

strengthen decision-making at the local level by increasing the financial viability and operational and managerial performance, as well as the capacity of the local utilities, and improving the overall accountability framework. This program has been developed based on governorate (local) level Master Plans that are designed to meet projected demands for sanitation services of villages by 2037, with priority focused on highly populated areas that are facing heavy pollution loads. The goal is to achieve 100 percent coverage of rural villages with a population of over 45 million through access to sustainable sanitation services and the discontinuation of improper discharge of untreated waste.

17. ***The Bank-financed Sustainable Rural Sanitation Services Program for Results (“Program”) requested by the Government is reflective of the shift in how the sector will be managed, and to this end, it aims to pilot a set of institutional strengthening measures that will enable the GoE to most effectively meet its program objectives.*** The Program, in support of the NRSP, reinforces the switch from centralized infrastructure investment to accountability for localized service delivery and increased responsiveness to citizens’ needs. It involves:

- structural shifts in responsibility from centralized agencies to regional water and sanitation utilities (through built-in incentive systems and capacity-building);
- restructuring of public financing of sanitation services through the introduction of transparent and formula-based fiscal transfers linked to service delivery performance;
- stronger and clearer results-based incentives for improved performance of WSCs in the areas of operations, financial management, institutional systems, and citizen engagement;
- development of bottom-up and top-down accountability measures through publicly available information from the regulator, citizens report cards (beneficiary surveys/feedback), complaints handling mechanisms, audit enhancement, and independent verification that all enhance voice and inclusion;
- strengthened role of the regulatory body in acquiring and making public the performance information for individual WSCs and the sector overall;
- support of pro-poor interventions through related investments (for example appropriate technologies in satellite, or more remote, villages), increased engagement with the poor, and inclusion of specific subsidies in the new tariff structure;
- flexibility in the adaptation and scale-up of lower cost technology using community-managed sanitation systems, including in partnership with CSOs and the private sector, where appropriate; and support of institutional and policy improvements at the national level to bolster scaling up of the Program to all governorates and long-term sustainability of service delivery.

18. ***Citizen Engagement is a key element of the Bank-financed Program, and is fully aligned with Egypt’s Sustainable Vision 2030, launched at the Economic Development Conference (Sharm el-Shaik, March 14, 2015).*** Vision 2030 “promotes the creation of a democratic political system that respects human rights, citizenship, and rule of law; a system that interacts with global developments, supports decentralization, and enables community empowerment, along with integration of all groups and social classes in the political process as long as they abide with the rules of the political structure, and that strengthens the role of institutions and civil society to enrich both institutional and non-governmental work.” Accordingly, the Program supports beneficiary surveys and citizen report cards, improved grievance mechanisms, awareness campaigns, and customers’ complaints handling mechanisms following best international practices for water and sanitation utilities.

19. ***This Program is consistent with other Government initiatives, as well as with the support provided by development partners active in the water and sanitation sector, and reflects lessons learned from past Bank operations in the sector.*** The GoE's own program, the NRSP, plays a critical national role and has been adopted as one of the key Presidential Programs. To this end, a Program Management Unit (PMU) has been established in the office of the Minister of Housing, Utilities and Urban Communities (MHUUC) with a mandate to take the National Rural Sanitation Program and Strategy forward while reporting directly to the Office of the Minister. Within the national program and its objectives of increased sanitation coverage and improved services in rural areas, the Bank-financed Program will test a new service delivery model in three governorates with the ultimate aim that if it were successful, the GoE would consider a broader national scale-up. The Program is consistent with the lead being taken by the Ministry of Local Development (MoLD) which is drafting a new Local Administrative Law that is currently under consideration. The law would essentially enact the decentralization of utility service delivery at the governorate level, including promoting greater use of technology for sharing information with the public, expanding citizen engagement, and encouraging public-private partnerships.

20. ***To ensure consistency with ongoing and new programs, the GoE has also engaged with other major financing partners – the Islamic Development Bank, the various Arab Funds, and the European Bank for Reconstruction and Development (EBRD) – to support this new approach.*** It builds on the technical assistance provided in the past by the United States Agency for International Development (USAID), the European Union (EU) and the German International Development Organization (GIZ). Importantly, the Government has already formally restructured ***the ongoing Integrated Sanitation and Sewerage Infrastructure Project (ISSIP) 2 to support the creation and initial activities of the PMU, as well as preparation of this Program.***

21. ***The GoE recognizes that the planned institutional restructuring may face strong resistance and has taken measures to mitigate this challenge.*** At the same time, the Government has clearly signaled its support to the new approach through its desire to carry forward the proposed operation. In order to mitigate the risks associated with program implementation, the GoE decided to establish the PMU for the program in the office of the Minister responsible for the sector. The Government has highlighted that the PMU, beyond the normal coordination of the Program and the National Rural Sanitation Strategy, is intended to ensure the close oversight by the Minister, - and through the Minister by the Cabinet of Ministers, - of the program's implementation and of the roles played by the various sectoral agencies. At the same time, because of the high priority given to the program by the President of Egypt, it is subject to frequent reports to the President and monitoring by his staff.

C. Relationship to the CAS/CPS and Rationale for Use of Instrument

22. ***The proposed World Bank support to Egypt’s NRSP is consistent with the World Bank Group’s Interim Strategy Note (July 2012 to December 2013) and the forthcoming Country Partnership Framework (CPF) currently being developed.*** The Interim Strategy proposed a concrete program of support in which water and wastewater are important elements. Specifically, under the pillar of Inclusion, the Strategy focused on the objective of broadening citizen participation in the delivery of water services, increasing efficiency and equity in service delivery, improving targeting of subsidies, and reducing the cost of pollution through better management of wastewater. Citizen engagement is a key element of the Program, which supports and incentivizes beneficiary surveys and citizen report cards, improved grievance mechanisms, awareness campaigns and more. The draft CPF stresses the importance of access to basic services, particularly in rural areas where the combination of high population density among the bottom 40 percent of the population and low coverage rates may propagate economic disparities. Improved service delivery can enhance governance and inclusion and give greater voice to citizens, again particularly in rural areas where the poor live and where low access, poor service standards, and environment degradation are prevalent. As a result, the CPF identifies the strengthening of water services in terms of both outreach and sustainability as program priorities.

23. ***In addition, the issue of pollution is an important thread throughout the CPF as the deterioration of water quality adds to health and economic burdens.*** There is an alarming combination of water scarcity and groundwater aquifer pollution, as well as heavy surface water pollution of the Nile River and its many branches, canals, and tributaries in the Delta, due to industrial waste, agricultural run-off, seepage from livestock, and untreated rural wastewater. By providing sanitation infrastructure and services to rural villages along the Al Salam Canal and the Rosetta Branch, the Program for Results (PforR) is expected to contribute to significantly reducing pollution in these waterways.

24. ***This Bank-financed Program is closely aligned with the World Bank Group’s twin goals of eliminating extreme poverty and boosting shared prosperity in a sustainable manner given its potential positive impact on the poor, including women and girls, as well as providing improved service delivery mechanisms to achieve universal access.*** The Bank’s entry point through this new engagement will be “service delivery for inclusion,” which is at the heart of the strategy adopted in both the Interim Strategy and the CPF, and is consistent with the GoE’s own request to the Bank. Supporting a system of efficient and transparent fiscal transfers that will empower local service delivery is a critical element of improving basic services and enhancing greater economic inclusion. Furthermore, targeting poor households in rural areas and improving their access to sanitation remains vital for development. Poverty rates are highest in rural regions where access to water, waste disposal, and health services remains significantly lower than in urban areas. The poorest 40 percent of Egyptian households is concentrated in rural regions. In terms of the poorest 40 percent, 21 percent of Egypt’s bottom 40 percent reside in the rural Delta and 24 percent reside specifically within the geographic scope of the PforR in Beheira, Dakahliya, and Sharkiya.⁵ The NRSP explicitly seeks to reduce this urban-rural divide in the sanitation sector across all of Egypt. In line with this, the Program is designed in part to target poor households – for example through improved access to decentralized sanitation solutions in satellite (remote) areas, which are often the most excluded from basic services provision. The Program will also support the development

⁵ Calculations based on the Egypt Poverty Map, 2013.

of a pro-poor strategy to increase household awareness on sanitation issues and to enable service providers to better understand and respond to the needs and demands of poor households.

D. Rationale for Bank Engagement and Choice of Financing Instrument

25. *The World Bank continues to be one of the key partners of the GoE in the rural sanitation sector.* Since 2008, the ISSIPs have supported investments in both Upper and Lower Rural Egypt and have attempted to promote a gradual shift towards decentralized and alternative wastewater collection and treatment systems. However, as highlighted above, the necessary institutional improvements were stalled and the intervening years of political instability with frequent turnover of responsible authorities impeded the Government from taking bold action, with the result that both projects were initiated very slowly, implementation progress was very slow, and costs were very high. Following several years of difficult dialogue, a commitment to resume the restructuring and improvements in the water and sanitation services sector was signaled, with the arrival of the current Government, at the highest levels, and restructuring of ISSIP 1 and ISSIP 2 was undertaken to simplify institutional responsibilities and accountabilities with positive results in terms of implementation progress and more efficient costs. However, as the ISSIPs are focused on infrastructure rather than on the service delivery institutions, their ability to influence the root causes of the sector’s past performance problems, as well as to build more sustainable and citizen-accountable service agencies, remains limited. The current Program was designed by drawing lessons from the design and implementation of ISSIP 1 and 2, as described in Box 1 below.

Box. 1: Lessons learned from ISSIP 1 and 2 to inform PforR operation design and implementation

ISSIP 1 was intended to support a more decentralized model of sanitation service delivery with enhanced community involvement. However, at negotiations, Government insisted on enhancing the role of the centralized agencies in implementation, arguing that this was needed in the face of relatively weak WSCs, and this approach was carried forward in the complementary ISSIP 2 project, which was intended to scale up support to the rural poor in the wake of the “Arab Spring.” At the time, the Bank agreed to this revision of the original design with the expectation that there would be adjustments consistent with the original design, as experience was gained and additional analytical work provided a stronger case for decentralized implementation. Unfortunately, this approach reflected an insufficient understanding of the resistance of the centralized institutions to take this dialogue forward once the agreements had been negotiated and signed, particularly in the context of the political turbulence that followed. In addition, Government has recognized the poor performance of the centralized approaches under ISSIP 1 and 2 and several other Government and donor-funded programs, and so has signaled a willingness to take bold measures to establish a more effective service delivery approach in the face of strong social pressure to demonstrate results in rural sanitation. Accordingly, based on assessment of the ISSIP experience with Government, the Program reflects the following lessons learned:

a. Focus on service delivery and infrastructure. Previous projects were designed primarily to finance infrastructure – mainly wastewater treatment plants, pumping stations and network extensions – without a clear focus or accountability for either service improvements to beneficiaries or efficiency or sustainability. This reflected the dominant role of the centralized construction agencies in the projects relative to those responsible for service provision. This also accounted, in part, for the lack of attention to either economy in technical designs or quality of construction to maximize the operational life of facilities. By working directly with those most accountable to customers for the speed, cost, and quality of services – the WSCs – the proposed Program follows global best practice in aligning incentives for improving implementation (see Disbursement Linked Indicators (DLIs 1 and 2). Further, by supporting the role of the regulatory authority, transparency of performance information, and integration of mechanisms such as citizen report cards for direct client feedback, the Program reinforces a “service culture” approach, rather than simply a “build and abandon” approach.

b. Streamline and strengthen Government and Bank required procedures. In Egypt, as in many Middle East and North Africa (MENA) countries, while Government agrees formally that donor procurement, financial management and safeguards procedures will take precedence, in practice this means that both national and donor procedures are followed concurrently, with the result that procedures are confusing to implementers and are quite lengthy and repetitive. For example, under the ISSIPs, approximately 110 days were typically required between the appointment of the designers and selection of the contractor, and just client approvals alone (before construction starts) could take up to one year. There was significant confusion and disagreement on procedures amongst agencies, particularly regarding the application of Egyptian requirements in areas such as procurement and land acquisition. Under the proposed program, implementation will be based on Government procedures, assessed by the Bank and with agreed clarification of processes. As part of the Program, land acquisition procedures will be further streamlined through the development of “Standard Operating Procedures” (see DLI 6) which harmonize Egyptian requirements with international practice and which include clear sequences for reviews and approvals as well as service standards guiding time taken, improving the overall basis for improving implementation of investments in the sector overall.

c. Strengthen the overall capacity of WSCs. In addition to the limited role of the WSCs under the ISSIPs in the design and construction management of infrastructure, the projects also failed to consider the need to strengthen the overall capacities of the WSCs to operate as water supply and sanitation utilities. Important and effective technical assistance was provided through grant support from the Swiss SECO (State Secretariat for Economic Affairs) under ISSIP 1, which has recently resulted in accelerated implementation and better construction supervision. However, this TA by design has focused on the ability of the WSCs and other actors to carry out project-related functions and has not addressed the more fundamental strengthening needs in terms of financing and operations which provide the basis for the sustainability of services as well as providing a stronger basis for the WSCs to assume the prominent role in sectoral investment planning and implementation. Accordingly, the proposed Program, while supporting significant expansion of critical infrastructure to permit delivery of rural sanitation services, will also address the strengthening of WSCs towards becoming self-standing utilities across their various functions (see DLI 3).

d. Leverage sector-wide needs. As investment projects, the ISSIPs had limited scope and leverage to influence key constraints at the sector-wide level. For example, there were no provisions for engaging dialogue on Egypt’s extremely low service tariffs, which undermine WSC autonomy and O&M capacity. Similarly, there was no scope for helping the GoE consolidate its many own and donor-funded initiatives towards a consistent, results-based strategy and investment program, with clear “rules of the game.” Under the proposed program, a specific set of DLIs (see DLIs 4, 5, and 6) are focused on addressing tariff restructuring as well as on the introduction of a robust, sectoral strategy that can guide sectoral implementation and investment across projects and partners. This also provides a clear space for discussing other sector-wide and inter-sectoral concerns, such as Law 48 on water quality standards, and innovative technology options.

26. ***The GoE has requested the World Bank to support its agenda to enhance the performance of the water and sanitation services.*** In September 2014, the Minister responsible for water supply and sanitation services (MHUUC) requested the Bank’s support for the NRSP, highlighting the Government’s willingness to advance institutional measures needed for the successful implementation of the program. Based on this request and willingness to undertake these important institutional measures, and taking into account the long experience of the Bank and other development partners in the sector, and the genuine need for a transformational national program that focuses on building a new model of sustainable and accountable service delivery, the Bank agreed to support the Government’s preparation of the new program.

27. ***The initial focus of the NRSP is to improve access and services in 769 villages in seven (7) governorates that discharge untreated wastewater into the Al Salam Canal and the Rosetta Branch Canal:*** Beheira, Dakahliya, Sharkiya, Damietta, Giza, Menoufya, and Gharbiya. The total

estimated investment needs for the 769 villages amount to US\$2.8 billion, of which the World Bank is expected to contribute an amount of US\$1 billion. The first phase of the Bank-financed program will amount to US\$550 million.

28. ***The proposed financial instrument is Program-for-Results (PforR) financing which focuses Bank support on helping governments improve the design and implementation of their programs using country systems and directly linking achievement of results to the disbursement of Bank funds.*** This is particularly relevant in the rural sanitation sector in Egypt where the traditional focus on investments through Investment Project Financing (IPF) did not sufficiently incentivize results. The PforR is considered an appropriate instrument for channeling Bank support because of the value it will add to the NRSP by:

- (i) Ensuring a focus on the development objectives and the results which Government intends to achieve— sustainable rural sanitation services as opposed to just infrastructure investments;
- (ii) Strengthening the Government’s own systems which it wants to adopt at scale, and not requiring a parallel set of technical, fiduciary, and safeguards instruments;
- (iii) Leveraging GoE and development partners’ financing to support a Program that has potential for scaling-up nationally;
- (iv) Supporting a move towards a focus on service delivery and WSC capacity and autonomy away from an exclusive focus on centralized construction corporations being the key decision-makers in the sector;
- (v) Increasing incentives to include the generally excluded, poor neighboring “satellites” (or “sub-villages”) in the design of the systems;
- (vi) Strengthening accountability and transparency as well as the Government’s systems for Monitoring and Evaluation (M&E), through the introduction of verification protocols;
- (vii) Enhancing citizen engagement through access to information and participation in WSC processes, strengthening voice and inclusion; and,
- (viii) Introducing path-breaking performance-based fiscal transfers as a way to incentivize efficient investment planning and implementation throughout the chain, particularly at the WSC level.

29. ***This operation represents a fundamental shift from centralized investments in infrastructure to strengthening the system of local accountability to achieve improved service delivery.*** As such, the approach draws upon the analytical framework of the 2004 World Development Report (WDR) "Making Services Work for the Poor" which makes a case for reforming both the relationship between central government and service providers (referred to as the "compact") and the relationship between the beneficiary and the service provider ("client power") to embed twin forms of accountability. The program also draws upon a variety of international experiences on reform of intergovernmental incentive systems as well as utility reforms to deliver services. It learns from Latin America, particularly Chile, which corporatized its water utilities in the context of economic decentralization rather than political decentralization. It is also informed by the experience of Bangladesh's Local Government Support Program. While the Bangladesh case gives insights on how central government can design multi-tiered intergovernmental fiscal transfer systems to create accountability at the local level, the Chilean case demonstrates how central government can create accountability in local water utilities. Other lessons come from countries like Australia, Brazil, Mexico, Colombia, and the Netherlands, which have made systemic shifts over a period of two decades. Lessons learned from these countries are about how to sustain change over time, and the importance of both changing the incentives between

government and the service provider as well as progressively bringing the users into the feedback loop, thus creating an important separation of roles and a contestability within the system of service delivery.

II. PROGRAM DESCRIPTION

A. Program Scope

Government Program

30. ***Through the launch of the NRSP in 2013 which articulates investment needs of about US\$14 billion, the GoE has signaled its priority to increase access to sustainable sanitation services to help reduce poverty and enhance shared prosperity.*** The overall goal of the NRSP is to foster sustainable access to rural sanitation services and it is the overarching program for the rural sanitation sector. It aims to achieve 100 percent sanitation coverage of 4,700 villages and 27,000 “satellites,” with an estimated population of 45 million, through access to sanitation services, as well as discontinuation of the practice of improperly discharging untreated wastewater. The investment needs of the NRSP have been estimated at LE100 billion (US\$14 billion).

31. ***Strengthening accountability to citizens is a core aspect of the Government’s service delivery improvement strategy.*** In accordance with its policy of decentralizing service provision, the GoE intends to strengthen the social contract between service-delivery organizations such as WSCs and the citizens who avail themselves of these services. Moving away from a top down approach to the planning and execution of infrastructure services, the Government intends to enhance the formal and informal accountability relationships of service providers by putting in place systems and practices for active citizen engagement as part of the WSCs’ planning and management systems. By strengthening the downward accountability of WSCs to their customers, the Government expects the investment and service-delivery decisions of WSCs to be more responsive to local priorities, and intends that the quality of service delivery will be improved through active feedback from citizens and civil society.

32. ***The strategy supported by the NRSP includes harnessing economies of scale by clustering villages to enhance the technical, economic, environmental, and social feasibility of wastewater treatment systems.*** The pillars of the strategy include: i) improve household hygiene; ii) prevent pollution; and iii) improve water quality through re-use of wastewater. The program is structured around a series of rural sanitation Master Plans that are designated to meet demand projected out to 2037, and which are regularly updated by the HCWW with input from the WSCs. The plans focus on villages of more than 5,000 inhabitants, and include proposals for a series of priority projects. Clustered approaches have been prioritized to achieve economies of scale when the villages are relatively close, and to reduce the number of treatment plants needed. Priority has been given to villages located near waterways, in order to reduce pollution loads, as well as to villages with high water tables and to villages in highly populated areas.

33. ***The NRSP is grounded in a series of performance improvement measures initiated at the local utility level.*** For example, HCWW has developed instruments to certify treatment plants; measures to develop the master planning into dynamic decision-supporting systems; measures to improve monitoring, evaluation, and reporting; and measures to train and certify different grades of technicians and engineers through class room and on-the-job training. In order to monitor WSC

performance, the program includes a set of KPIs. Regarding national sector policy, the document “Development Policies, Water and Wastewater Sector in Egypt” (2010) has identified the main challenges as water scarcity, institutional fragmentation, and, financial sustainability.

34. ***The initial focus of the GoE is to improve access and services in 769 villages in seven (7) governorates that discharge untreated wastewater into the Al Salam Canal and the Rosetta Branch, which is estimated to require investments of about US\$2.8 billion.*** The seven governorates are: Beheira, Dakahliya, Sharkiya, Damietta, Giza, Menoufya, and Gharbiya. This initial phase of the Program does not cover all the villages in the seven governorates, but primarily covers those that discharge into the Al Salam Canal and the Rosetta Branch in the three governorates, namely Beheira, Dakahliya, and Sharkiya.

35. ***The Government has approached the Bank to provide support in three specific governorates, and as part of the Bank Program, is piloting an institutional approach that encourages greater financial and service delivery sustainability, as well as a strengthened enabling environment, which would allow for future scale-up to other governorates.*** As part of the improvement strategy in the sector, the GoE intends to restructure the current system of financing sanitation services and intends to introduce a formula based system of fiscal transfers to the WSCs so that financial resources are available to WSCs in a transparent and predictable manner, and to provide incentives to enhance institutional performance and accountability in the sector. In addition, the Government intends to clarify and strengthen the roles and responsibilities of central ministries and agencies, such as the HCWW and the EWRA, to ensure a coordinated and coherent approach to service delivery in the water sector. The GoE is also working with development partners, including the Bank, to strengthen the capacity of the WSCs. Moreover, a new water and wastewater tariff structure has been designed and is currently undergoing consultations within the Government. This reportedly would allow WSCs to cover O&M costs within five years of implementation.

Bank-financed Program

36. ***The Sustainable Rural Sanitation Services Program for Results (the “Program”) is a results-based program supported by the World Bank aimed at strengthening institutions and systems to provide greater access and improved service delivery of rural sanitation services in three governorates in the Nile Delta.*** The Program is embedded in the Government’s 2013 National Rural Sanitation Program described above, and will pilot further institutional strengthening that is intended to eventually be scaled-up in other governorates of Egypt. The Program aims to reduce poverty and enhance shared prosperity by providing access and improved services in rural villages and satellites, which have often been excluded from basic sanitation service provision in the past. This will be accomplished through new sanitation connections (mostly but not exclusively to sewerage systems) which will involve improved wastewater collection, treatment, and management. In order to do this most effectively, the Program reconsiders the existing service delivery model.

37. ***The Program builds on the Government’s decision to shift from a centralized model of service delivery to a decentralized model that empowers the WSCs to improve service provision.*** For the Program, the Government has made the strategic choice to pilot a system of fiscal transfers of performance-based capital grants (PBCG) to strengthen accountability and transparency at the local utility level for the delivery of rural sanitation services in three governorates. Disbursements

of the PBCG are linked to an incentive regime of Annual Performance Assessments (APAs) that will be designed and implemented on a transparent and predictable basis centered on a formula taking into account the Operational, Financial, Institutional, and Citizen Engagement dimensions described in more detail below.

38. *The Program strengthens the accountability of basic services provision to rural citizens.* The Program is centered on empowering the WSCs, as they are the service delivery entities closest to the beneficiaries and as such, they would be expected to meet citizen demands – if properly incentivized and empowered. The Program provides direct incentives through disbursements linked to improved citizen engagement processes and results, described in detail below. In addition, the Program supports capacity building of EWRA as a means to further strengthen accountability in service delivery.

39. *The Program focuses on the three WSCs operating respectively in the governorates of Beheira, Dakahliya, and Sharkiya respectively and helps to reduce poverty and enhance shared prosperity in these areas.* The total number of beneficiaries of the Program that are below the household poverty line is expected to reach over 246,000, representing 30 percent of total Program beneficiaries. Over 76,000 individuals covered under the Program fall within the poorest forty percent in terms of mean per capita expenditure per annum. These individuals are distributed across 22 villages targeted under Phase one of the Program. The table below provides a summary of the poverty map for Phase one of the Program.⁶ It is clear that a well-designed intervention in the sanitation sector could have a real impact in terms of poverty alleviation (see economic analysis of the Technical Assessment for further analysis).

Table 1: Results of Poverty Mapping for Program

	Number of Villages under Phase One	Total Population (2013)	Total Poor (2013)	Average Expenditure per Capita per Annum (EGP)	Average Poverty Rate (%)
Beheira	8	92,037	19,854	5372	21
Dakahliya	94	591,004	101,864	5427	17
Sharkiya	53	541,103	124,539	5183	23
Total	155	1,224,144	246,257	15,982	61

40. *By prioritizing rural sanitation services in these governorates in the Nile Delta, the Program will also contribute to reducing the pollution resulting from untreated or inadequately treated wastewater discharges into the Al Salam and Rosetta Branch waterways as well as the high incidence of acute outbreaks of contamination of drinking water systems.* Therefore, there is a strong environmental and public health rationale for choosing these three governorates. Also,

⁶ Estimations of the total number of poor that will benefit from the Program were calculated based on the Egypt National Poverty Map for 2013 developed by the Central Agency for Public Mobilization and Statistics (CAPMAS). A 2005 study undertaken specifically in Dakahliya, one of the three governorates targeted under the Bank-financed Program, found that the incidence of diarrhea was significantly higher amongst children under five in rural areas (67 percent) compared to urban areas (33 percent). Furthermore, households with flush toilets experienced less incidence of diarrhea at 20 percent, compared to 80 percent for households with non-flush toilets.

poor sanitation conditions lead to repeated episodes of diarrheal disease and parasitic infestations. The prevalence of diarrhea in children under the age of five is highest in Rural Lower Egypt and disproportionately impacts the poorest.⁷ In terms of enhanced prosperity, without improved sanitation access and wastewater treatment, rivers, and other water sources become contaminated, increasing pollution and affecting livelihoods. Small-holder farmers and landless farmers constitute the vast majority of the rural population as well as the majority of rural poor.⁸ Most small-holders have limited access to water in terms of quality and quantity, making clean water availability a binding constraint for agricultural development and poverty reduction in the Delta.

B. Program Activities

41. **Scope of the Program.** The duration of the Program will be five years, with a start date of July 28, 2015 and targeted completion in October 2020. Due to the current financing that has been identified, and the ultimate magnitude of investments required, the Program focuses on a subset of villages within the three selected governorates for investments related to increased access. However, the broader program of service improvements and national sector strengthening are more wide reaching. The bulk of the Program financing will be used to finance annual capital grants to the three WSCs to undertake rural sanitation infrastructure investments in accordance with their Master Plans and Annual Plans (Results Area 1). The remainder of the resources will be used for strengthening the performance and institutional capacities of WSCs (Results Area 2), and for strengthening the national institutional framework (Results Area 3).

42. **The Program Activities are described below through three Key Result Areas:** (1) Improved Sanitation Access; (2) Improved Operational Systems and Practices of WSCs; and (3) Strengthened National Sector Framework, and the scope of each Results Area is summarized in Table 2 below.

Table 2: Scope of Results Area

EXPECTED RESULTS	GEOGRAPHIC SCOPE
Results Area 1: Improved Sanitation Access	
About 167,000 new households (about 833,000 people) connected to working sanitation systems in villages and satellites in the three governorates in the Program area	Targeted Villages and Satellites
Results Area 2: Improved Operational Systems and Practices of WSCs	
Improved capacity, investment planning, operations and general service delivery of each of the three participating WSCs (Beheira, Dakahlia, and Sharkiya)	Three WSCs in the three Governorates
Results Area 3: Strengthened National Sector Framework	
Improved enabling environment for more sustainable rural sanitation services	Rural Egypt

⁷ Egypt Demographic Health Survey (DHS), 2014.

⁸ “Improving Regional and Rural Development for Inclusive Growth in Egypt,” Brookings. 2014.

1) Activities Within Results Area 1: Improved Sanitation Access

43. *The Program is structured to incentivize the provision of access to sanitation to about 833,000 people living in the three governorates of Beheira, Dakahliya, and Sharkiya, with each governorate serviced by a separate WSC.* Improved access is determined by a connection to a sewer network that is linked to a wastewater treatment facility meeting Egyptian treatment standards, or to any other acceptable sanitation solution (including decentralized systems). The Program targets about 167,000 new connections, or approximately 833,000 people, living in villages in the Program area of the three WSCs that routinely discharge their sewerage into the Nile River system, as well as the satellites⁹ around them. The identified service areas are considered first priority as determined in the Master Plans and the selection of villages within the program area remains flexible. These new HH connections targets fits within the budget of about US\$500 million available for capital investments.

44. *The Program will support decentralized sanitation systems for poorer or more remote households, and supports a Pro-Poor and inclusive strategy.* The Program provides incentives to the WSCs to reach out to “satellites,” areas generally on the outskirts of the main villages. People living in satellites are often most excluded from basic services as their homes are difficult to reach through a sewer connection, both from an engineering and cost perspective. However, these satellites can also be served with more cost effective decentralized solutions. Therefore, an additional disbursement-linked incentive is included under Results Area 1 for WSCs to make additional efforts to reach out to these often excluded beneficiaries. Other pro-poor measures (e.g. phased payments of household connection fees) will be assessed under the Water and Sanitation Program (WSP) technical support and initiated through the Performance Improvement Action Plan (PIAP) and the National Rural Sanitation Strategy (Results Areas 2 and 3).

45. *In order to ensure that increased access supported through this Results Area is linked to more sustainable service delivery, the Program will put in place a system of PBCGs from the Central Government to the WSCs to support priority rural sanitation investments identified through the Five Year Plans and included in the Annual Capital Investment Plan of the WSCs.* It should be noted that the introduction of the PBCG system would be a key contribution of this program as it would introduce transparency and predictability in the financing of sanitation services as well as promote a culture accountability in the WSCs to their stakeholders. It would be the first such system of fiscal transfers in Egypt for local service delivery. Experience in the United States and other countries in the Organization for Economic Co-operation and Development (OECD), has shown the value of use of multiyear projections and dependence on meeting performance standards. The revolving funds programs for water and wastewater in individual states in the United States provide good examples of the use of this system.

46. *The performance-based capital grants will be allocated to the WSCs on a per capita basis and will be determined by the ability of the WSC to meet the performance standards set by the MHUUC and measured through a set of Minimum Requirements (MRs) and performance targets with increasing levels of ambition throughout the implementation of the Program.* The Program will start with a base grant allocation for the first two years that will be available to the WSCs upon the satisfaction of the MRs. The MR would be both financial management-related (i.e.

⁹ Satellites are defined as small villages in area and in population number. In most cases, a satellite is one village and farms and hamlets could be affiliated thereto (Source: CAPMAS, 2014).

audited financial statements submitted by the WSCs as well as procurement-related (i.e. percentage of contracts awarded and executed against estimates). These are fiduciary measures put in place by GoE to enhance the fiduciary assurance related to the fiscal transfer system. From the third year onwards, in addition to the base grant, a performance-based grant will be provided to the WSCs based on their performance against the Annual Performance Assessments (APAs) in operational, financial, institutional, and citizen engagement areas. The performance-based capital grants will be programmed into the National budget annually and structured as unconditional fiscal transfers that will flow from the National budget into the annual budget of the WSCs, which the WSCs can use to finance the investment projects prioritized in their annual capital investment plans. In the event of any WSCs not receiving the performance top-up, it would be reallocated into the total grant pool available to the WSCs for investment (related to Results Area 1).

2) Activities within Results Area 2: Improved Operational Systems and Practices of WSCs

47. *Participating WSCs will be explicitly incentivized to improve investment planning, operations and maintenance, and service delivery through the compensation and reward mechanisms built into APAs.* APAs will be designed and implemented on a transparent manner centered on a formula taking into account four key dimensions: Operational; Financial; Institutional; and Citizen Engagement. These performance standards will relate to measures demonstrating performance, including for example:

- Operational: comprising indicators measuring: (1) wastewater treatment plants in compliance with Egyptian law and standards; (2) O&M cost recovery; and (3) Septage management.
- Financial: including indicators such as: (1) Operating ratio; and (2) Collection Efficiency.
- Institutional: addressing areas such as Efficient Procurement and Contract Management Processes, as well as Financial Management processes such as internal controls and audit opinions.
- Citizen Engagement: addressing areas including: (1) complaints handling mechanisms are in place; (2) base line for beneficiary feedback surveys / citizen report cards is established ; (3) procedural guidelines for community engagement; (4) access to information related to services delivery to beneficiaries, and (5) community consultation regarding decisions about sanitation systems models, technologies and operation and maintenance schemes. In order to show progress and improvements over time (years 3 through 5), WSCs will need to address the specific ‘problem’ areas that are identified in the surveys, otherwise they will not improve. Therefore the PIAP will require that an appropriate mechanism to assess and respond to the results is explicitly included.

The weights of the four categories will be approximately 25% each.

48. *Cost recovery will be one of the critical factors in determining the performance score of the respective WSC.* The performance improvements put in place, as well as the APA score, will help support and incentivize each WSC to improve performance and reduce costs. Because the Program is structured as results-based, and therefore not prescribing any specific technology (although following Egyptian standards), it is expected that unit costs should eventually decrease. Moreover, since the Program places the investment planning responsibility with the WSCs, it is expected that the WSCs, HCWW, and the MHUUC will strive for more cost-efficient solutions

that would bring operating costs down by better aligning investment choices with feasible and efficient operating procedures. By placing the operating ratio in the APA formula, the WSC's are provided with an explicit and transparent incentive to improve along these lines.

49. ***EWRA is expected to play a critical role in the assessment of the WSCs performance.*** Supported by the WSP and other Development Partners, EWRA is expected to develop a national benchmarking system to compare and publish information on WSCs performance, and in particular, on the financial, operational and citizen engagement dimensions of the WSCs participating in the Program. Moreover, EWRA will provide technical support to the WSCs for carrying out the APA process, in particular, measurement, benchmarking and reporting, as well as increasing the accountability of service delivery.

50. ***In order for the WSCs to be able to deliver on the annual performance targets established in the APAs, they will need technical support, which is embodied in the Performance Improvement Actions Plans (PIAPs) for addressing managerial and operational gaps and weaknesses.*** The PIAP would be similar to detailed business plans, and would comprise measures to improve performance across the areas of the APA (operational, financial, institutional, and citizen engagement). In general, the PIAP would include, among other things: (i) identification of gaps and weaknesses in the existing systems and processes of the WSCs with a focus on the areas measured under the APA; (ii) development of modern management and financial systems; (iii) plans for improving all aspects of revenue administration, including billing systems, collection, administration of arrears, lowering the cost of revenue collection, and administration; (iv) plans for setting up non-revenue-water reduction programs; (v) plans for removal of key deficiencies in the water supply and wastewater management systems; (vi) strategies and measures for improved citizen engagement and consumer relations (including management of customers complaints and participation mechanisms); and (vii) a pro-poor strategy for each WSC to help identify the needs of poor households and the best options for ensuring sustained delivery (for example, phased payments of household connection fees). In addition to direct support through the Program for implementation of the PIAP, technical assistance will also be provided for upfront design and guidance, through the PMU and the HCWW (see institutional arrangements below).

51. ***The Program therefore sets up a system of interlinked incentives and performance enhancement measures that aim to test a new service delivery model that empowers local utilities to deliver improved services to beneficiaries.*** Through a well-designed and carefully implemented PIAP, the APA process will be informed and the WSCs will be strengthened to achieve the requisite scores on the APAs, which will in turn determine the magnitude of the PBCG (fiscal transfers) from the GoE to the WSCs (see Figure 1 below).

Figure 1: Program elements linked to guide institutional performance improvements



3) Activities within Results Area 3: Strengthened National Sector Framework

52. ***MHUUC will coordinate the Program activities for strengthening the enabling environment that will allow for more efficient and accountable rural sanitation service delivery and lend more fluidity to future scaling-up.*** This includes: (i) development of a tariff structure for water and sanitation services that would enable cost recovery; (ii) the formulation of a revised National Rural Sanitation Strategy, and the creation of a Central Unit (that is, the PMU) which will be responsible for the coordination of the National Rural Sanitation Program and implementation of the Strategy; and (iii) finalization of the standard operating procedures for land acquisition. These measures are critical elements for the long-term sustainability of the sector. A series of consultations and citizen engagement will help embed these institutional changes more firmly into the sector. The PforR Program being implemented in the three governorates will in particular rely on these institutional changes to support the deeper changes in service delivery mechanisms being implemented, but these broader institutional strengthening measures and national strategy developments will also in turn enable the replicability and scalability of the new service delivery mechanisms being piloted by the Program. Overall, the Program includes an important framework to leverage client feedback, public availability of information on WSCs performance and response to clients, and the role of the regulator and independent verification underpinning these processes.

53. ***The new water and wastewater tariff structure will constitute a first step towards a coherent national policy framework for setting—and linking—water and sanitation tariffs, subsidies, and cost-recovery goals.*** By supporting the new water and wastewater tariff structure, the Program will contribute to the financial sustainability of the WSCs by allowing them to recover operation and maintenance costs within five years of implementation. It will also support expanding affordable water and sanitation services for the poor, as the new structure includes cross-subsidies in which the first two consumption tiers are subsidized.

54. ***The National Rural Sanitation Strategy will be spearheaded by the PMU.*** The Strategy will incorporate clear guidance and policy on service delivery models, infrastructure development, technologies selection, including more cost-effective approaches through the Code of Practice, pro-poor service delivery, financing, cost recovery, community and citizen engagement mechanisms, and private sector participation, among other key areas that would shape access and service delivery in the sector. The strategy will lay the groundwork for a future national scale-up of the institutional and service-delivery model being piloted through the Program in the three governorates of Beheira, Dakahliya, and Sharkiya. Work on the strategy, and related due diligence, will identify any potential obstacles to a broader decentralization process for the water and sanitation sector in rural Egypt, and will suggest ways to move forward for scaling up.

55. ***Through the introduction of Standard Operating Procedures for Land Acquisition for the rural sanitation sector, this Program aims to support measures that may have an impact on timely implementation.*** As described in Box 1 in Section I, issues surrounding land acquisition have played a major role in the rural sanitation sector in Egypt, and therefore the Program has provided measures to mitigate related risks. Such operating procedures will not only help ensure timely implementation of the Program, but will form an important part of the enabling environment for scaling-up. The development of these procedures and related awareness raising will also help to strengthen communication and engagement among stakeholders.

56. ***The MHUUC will also undertake or commission relevant policy and analytical studies to inform the policy making process in the sector.*** Support may also be provided to the EWRA to

enhance its capacity to build and sustain an effective regulatory and oversight framework. With the decision of the GoE to move to a more decentralized model of service delivery, these policy and regulatory initiatives will set the stage for providing a strong enabling framework for empowering the WSCs to become efficient and accountable service-delivery institutions. This will also clarify the current overlap of institutional roles and responsibilities that act as a deterrent to clear institutional accountabilities.

4) Program Financing

Table 3: Total Projected Program Financing for the Three Governorates

Source	Amount	% of Total
GoE	US\$170 million	14%
IBRD	US\$550 million	44%
Other Donors		
EBRD and Other Funds	US\$530 million (TBC)	42%
Total Program Financing	US\$1.25 billion	100%

57. *The Program constitutes Phase 1 of the overall, programmatic support requested by the Government.* The Government’s overall request for support for the priority rural sanitation program discussed with the Bank is for US\$1.1 billion, covering approximately 769 villages. The Program, as defined in this PAD, focuses on the first phase support of US\$550 million of Bank financing (in addition to separate technical assistance provided) and covers between 155 and 200 villages in the areas described in Annex 10 (MAP Section) of the PAD in the three Governorates (Beheira, Dakahliya, and Sharkiya) constituting approximately 167,000 new household connections and related investments as well as the improvements outlined under Results Areas 1, 2, and 3. It should be noted that several donors, in particular EBRD, have expressed interest in co-financing a scale-up of the Program. The GoE has also indicated its intention to allocate US\$170 million to finance sanitation investments in the Program area. The Bank has discussed a second loan of US\$550 million with the GoE for a future second phase, whose preparation could begin soon after the launching of Phase 1 subject to progress in implementation of Phase 1.

C. Program Development Objective

58. *Program Development Objective (PDO): To strengthen institutions and policies for increasing access and improving rural sanitation services in the Governorates of Beheira, Dakahliya, and Sharkiya in Egypt.*

D. Program Key Results and Disbursement Linked Indicators

59. *Key Results.* The key results that will be measured to analyze success in achieving the PDO will include, as stated above: (i) people provided with “improved sanitation facilities” under the

Program; (ii) the design and implementation of the APA system to help improve investment planning and WSCs performance (WSC Operating Ratio); and (iii) strengthened institutional arrangements demonstrated by a revised National Rural Sanitation Strategy. All relevant indicators are described in the table below:

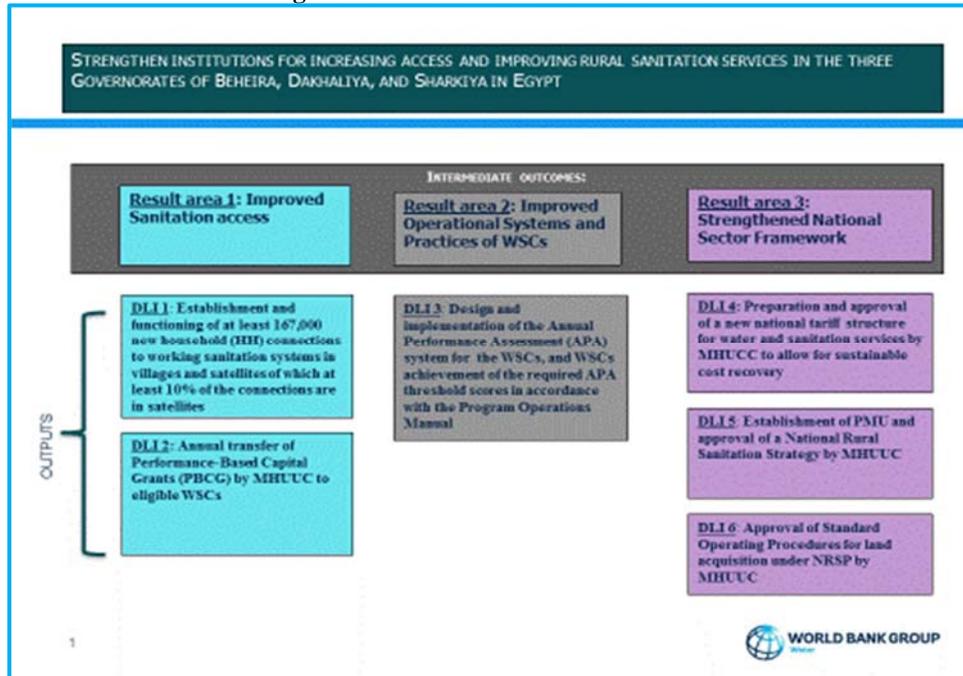
Table 4: Results Indicators: PDO Level Indicators and Intermediate Outcomes

<p><u>Results Area 1: Improved Sanitation Access</u></p> <ul style="list-style-type: none"> • Number of people, disaggregated by gender, provided with access to improved sanitation facilities under the program • Number of new functioning household connections made to working sanitation systems • Percentage of new functioning household connections in satellites made to working sanitation systems.
<p><u>Results Area 2: Improved Operational Systems and Practices of WSCs</u></p> <ul style="list-style-type: none"> • Annual Performance Assessments for each WSC implemented • Operating ratio • Citizen’s engagement: complaints handling/ grievance mechanism operational • Citizen’s engagement: citizen report card/ baseline and follow-up survey undertaken • Procurement and financial management systems improved.
<p><u>Results Area 3: Strengthened National Sector Framework.</u></p> <ul style="list-style-type: none"> • New National Tariff structure to allow for sustainable cost recovery approved • Central unit to coordinate Egypt’s National Rural Strategy established • Revised National Rural Sanitation Strategy adopted • Standard Operating Procedures on land acquisition for National Rural Sanitation Program issued.

60. ***The Results Chain.*** The results chain is provided in Annex 1 as part of the Detailed Program Design, and the Results Framework and Monitoring is provided in Annex 2.

61. ***DLIs for this Program were developed with the GoE to most effectively meet the PDO. They aim to provide the right incentives to the relevant stakeholders – PMU, HCWW, or the WSC – to achieve the required objectives.*** Six DLIs have been identified that will provide a balance between providing incentives to promote the achievement of each results area and the need to ensure a reasonable cash flow for the implementation of the new sanitation infrastructure. The results framework and DLIs are shown in the figure below.

Figure 2: Results Framework and DLIs



62. ***The DLIs listed under Results Area 1 relate to building and improving sanitation infrastructure, which will lead to improved access.*** When the GoE can demonstrate through an Independent Verification Agent (IVA) that a certain number of connections or satellites (which tend to be on average poorer than non-satellite villages) have been made, DLI 1 will be triggered. DLI 2 will be triggered when the PBCGs allocated are disbursed annually from the MHUCC to the eligible WSCs in a timely manner to help deliver access improvements promptly.

63. ***The DLIs listed under Results Area 2 relate to incentivizing the operational practices of the WSCs to improve service delivery.*** DLI 3 relates to the improvement planning of the WSCs, and the annual performance action plans are to be designed and implemented to trigger the disbursement. Later Disbursement Linked Results (DLRs) are triggered when the APA system for the WSCs is designed and implemented and the WSCs have attained the required PA threshold Scores. The APA is based on the following areas of performance: Operational, Financial, Institutional, and Citizen Engagement. More detail is provided on this DLI in the Detailed Program Description in Annex 1 and in the DLI protocol and related tables in Annex 3.

64. ***The DLIs listed under Results Area 3 relate to strengthening the broader national institutional and policy framework for the sector.*** These DLIs are critical for not only the long-term sustainability of the institutional strengthening implemented through the Program in the three governorates, but also for the scaling-up and sustainability of the improvements in the broader rural sanitation sector. DLI 4 relates to the adoption of a tariff structure that allows for greater cost recovery. This is essential for the financial viability of the WSCs and the financial sustainability of the sector. The tariff restructuring proposal is being reviewed by the Government and is expected to be enacted in FY2016. DLI 5 relates to the strengthening of the National Rural Sanitation Strategy, and in particular to the creation of a Central Unit that will implement the NRSP, and the revision of the national rural strategy, an initiative to be led by the newly created Central Unit (“PMU”). By including a pro-poor focus, service delivery mechanisms,

decentralization, community participation, appropriate technologies, cost recovery and financing principles, this strategy is expected to constitute a key policy instrument to scale up the Program to all governorates. In other words, the strategy will incorporate concrete actions to ensure the technical, financial, environmental and social sustainability of the program. The strategy will be complementary to Results Area 2 that also supports activities at the WSC level in several of those dimensions. DLI 6 aims to ensure better results for the environment and social protection through a wastewater facility code of practice and standard operating procedures for land acquisition. The latter is important for ensuring more efficient and equitable acquisition of land that may be required for new connections and the expansion of treatment facilities, including enhanced consultation and engagement with impacted communities.

E. Key Capacity Building and Systems Strengthening Activities

65. *The Program is structured to directly incentivize the PMU and HCWW to provide capacity-building support and to strengthen systems related to WSC performance improvements.* PIAPs will be developed by the PMU and implemented by the HCWW and the WSCs, consistent with their mandated institutional roles. The PIAP for each WSC will be structured as a detailed business plan containing improvement strategies along the four performance areas of the APA: operational, financial, institutional, and citizen engagement. The HCWW and the PIAP will be supported to help ensure that the WSCs are appropriately equipped with the know-how and skills to improve performance under the trigger for DLI 3, as described above. For this purpose, specific resources will be allocated to each WSC consistent with the level of ambition of the PIAP.

66. *The Program will finance specific activities to strengthen systems to support delivery of the program objectives and related results.* To ensure effective implementation, a Program Management Unit (PMU) has been established within the MHUUC. This PMU, a new Unit dedicated to the National Rural Sanitation Program and National Rural Sanitation strategy and therefore with a mandate beyond the Program, will be headed by a Director appointed by and accountable to the Office of the Minister, and will have a core staff of professionals with the necessary expertise and experience to undertake the PMU's mandate. The PMU will be granted a high degree of autonomy to ensure efficient and timely implementation of the program. The PMU would have experts in the following areas: rural sanitation, program management, procurement, financial management, environmental issues, social issues, and institutional relations, among others.

67. *Given the complex and multi-dimensional nature of the program, as well as its implementation challenges, the PMU will be assisted by a Program Management Consultant Firm (PMCF).* The PMCF will be a competitively selected firm with relevant national and international experience. This firm would play an essential role in overall project management and coordination, and provide critical support to the PMU, including on project management, planning of projects and activities, supervision of engineering work, assistance in procurement processes, and quality assurance relating to overall implementation of the program. The PMCF will provide support for the development of the PIAP. Given the Government's desire to initiate program implementation immediately, it has been agreed that under the restructuring of ISSIP 2, an allocation of US\$7 million will be available for financing the PMU and the PMCF, and the Government is in the process of selecting the consultant firm. This decision is consistent with

lessons learnt from other programs that underscore the importance of setting up implementation structures even before formal approval of the operations.

68. ***The Program will also provide support at the WSC level.*** Each WSC will be responsible for delivering the new infrastructure and will be supported by an Implementation Support Consultant (ISC), who will support the capital investment programs. To enable the WSCs to meet their performance targets under the Program, detailed PIAPs will be developed by the PMU with the support of the PMCF and the HCWW. Through these activities, the PMU, PMCF, HCWW, and ISCs will transfer capacity to the WSC.

69. ***In parallel with this operation, the WSP administered by the World Bank will complement the PforR lending operation with an initial US\$3.5 million technical support program during three years (starting in September 2015) to strengthen the capacity especially of the HCWW, EWRA and the WSCs as they work to deliver improved sanitation services including to the poor.*** The support provided by WSP will also aim at strengthening community-level citizen engagement, and at developing effective country systems for learning and knowledge sharing among rural sanitation stakeholders, which can facilitate the scale-up of social and technological innovations developed by NGOs and other non-state actors. In addition to the program, the WSP support will contribute to the in-country sector coordination platform, which will be a strong tool to enable sharing of knowledge, increasing sector evidence-based decision making, and reaching consensus among Government, donors and other stakeholders in the sector. Through either the initial WSP TA or a future tranche, further effective service delivery models will also be explored, including the scope for engaging the private sector and communities (for example to improve septage management). The WSP program will include a strong knowledge-sharing focus, through supporting local "learning" tours, strengthening the capacity of the PMU and HCWW as knowledge-sharing organisms, and organizing knowledge and exposure tours - both South-South and North-South - for key decision makers and influencers to visit countries with similar challenges and history. Another key element of the WSP program will be the support to EWRA, including on the use of modern benchmarking systems and citizen complaints handling mechanisms. EWRA will also benefit from participation in a Water Regulation Workshop for MENA Regulators organized by the Bank in Marseille in July 2015, as well as Bank support to facilitate partnerships with other Regulators. The WSP support will be coordinated by a dedicated WSP staff to be based in Cairo and working closely with the IBRD team.

70. ***Furthermore, the Bank will strengthen the Water GP team based in the Cairo office to provide support commensurate with a Program of this nature.*** However, as demonstrated by Swiss support under ISSIP and the experience of other donors such as the Netherlands, GIZ, EBRD, EU, USAID, and others, TA which is contracted at the local level is extremely important to reinforce capacities and build skills. As part of the efforts to leverage additional funding and support for the Program, the Bank and GoE have engaged with the EBRD and agreed to use similar instruments to support performance improvement of the WSCs, such as the Financial and Operational Performance Improvement Programme (FOPIP), which is standard in EBRD operations. The Bank will also coordinate with the German Development Bank (KfW) and the EU technical support to the WSCs in the program as they have ongoing operations with two of the three WSCs participating in this PforR.

III. PROGRAM IMPLEMENTATION

A. Institutional and Implementation Arrangements

71. ***The MHUUC is the Ministry in charge of the rural sanitation sector and as such, it will lead implementation of the Program through the PMU.*** The recent establishment of the PMU constitutes an important milestone given its leading role in the coordination of the National Rural Sanitation Program as well as the Rural Sanitation Strategy. Other key responsibilities of the PMU include to: (i) coordinate implementation of the NRSP; (ii) prepare a full-scale strategic action plan; (iii) supervise the procurement activities; (iv) follow up the implementation of the projects at the governorate level; (v) review and approve the investment plans relating to the villages sanitation projects, including the executive plans; (vi) ensure that the different Project implementation agencies submit periodic follow-up and evaluation reports; (vii) ensure that the project's designs and implementation activities are performed in accordance with the Project's conditions agreed to by the financiers; (viii) send performance-rate reports to the MHUUC; (ix) specify the reasons for plan deviations, if any, and propose remedial actions; and (x) work with donors and partners who finance the Projects in accordance with the strategic plan.

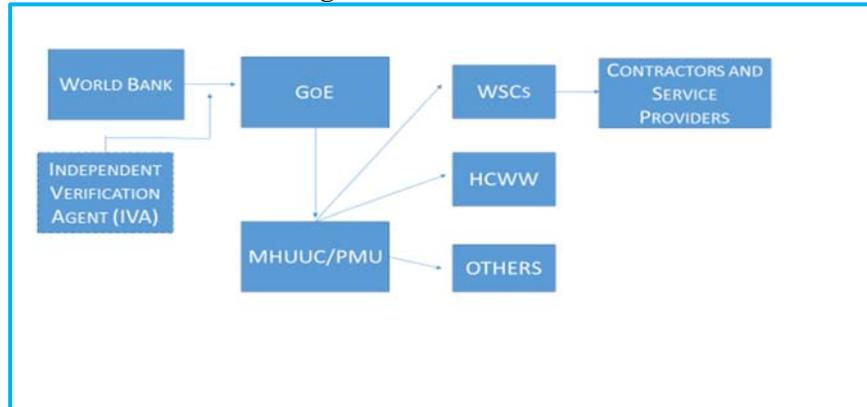
72. ***The PMU will be the central unit in charge of the NRSP and overall coordination of the PforR, although the WSCs will be the key implementing agencies for investments (with the support of the PMU), and service delivery (with the support of the HCWW).*** Formal implementation responsibility has been established as follows: WSCs, the HCWW and the PMU will all be responsible for implementation of Results Area 1 – although the majority of the responsibility falls to the WSCs as they will be empowered and incentivized to manage their performance and investment planning; WSCs and HCWW will be responsible for implementation of Results Area 2; and the MHUUC, through the PMU, will be responsible for implementation of Results Area 3.

73. ***The GoE will hire an internationally reputed firm with a strong local presence to be the IVA under the Program.*** The firm selected will demonstrate a wide array of competencies, and will have an international reputation to live up to. The IVA will work with EWRA as feasible, since EWRA will be able to provide substantial information and analysis as required. Although EWRA is not independent of the MHUUC, it is widely seen as a credible institution that is able to provide analytical and evidence-based recommendations and therefore can support the IVA as needed. Subject to increased capacity and demonstrated independence, EWRA may act as an IVA in future phases of the Program.

74. ***As the leading agency of the PforR Program, the MHUUC will receive the annual Performance Based Capital Grant funds and the allocations for the Performance improvements, as well as the policy support activities, as part of the annual budget allocations from the MoF through a designated account at the Central Bank of Egypt.*** MHUUC will then transfer the Performance Based Capital Grant funds to each of the WSCs according to their eligibility and entitlement. MHUUC will also transfer the funds relating to the support of Performance Improvement activities to the HCWW. The MHUUC through the PMU will authorize the release of funds to the WSCs and HCWW in conformity with Egyptian financial management systems and based on results per the MRs, which will be outlined in detail in the Program Operations Manual (POM). Upon the satisfactory achievement of the DLIs, the MoF will receive the Program funds from the World Bank. The Performance Grant funds will be released to the WSCs in two

installments, one at the start of the fiscal year in July and the second in January. The WSCs will prepare short monitoring reports and submit them to the PMU. The flow of funds is shown diagrammatically in Figure 3. An IVA will confirm the attainment of DLIs in order for funds to be released in accordance with the agreed schedule.

Figure 3: Flow of Funds



B. Results Monitoring and Evaluation

75. ***The PforR will support the establishment of a results framework and verification system for the NRSP.*** The national program does not yet have a results framework M&E system, since this PforR Program would be the first phase of the National Rural Sanitation Program and will be monitored at one level by a new body, the PMU.

76. **The Program M&E system will be based on a Results Framework with monitoring at all levels, including activities, outputs, and intermediate objectives. The M&E will be done at four levels of detail and frequency:** (i) normal day-to-day program management monitoring carried out by the ISC consultants on the infrastructure implementation, and the normal day-to-day monitoring systems used by the WSCs for their operations; (ii) monthly or quarterly Program reports prepared by the ISCs on behalf of the WSC that detail the activities and results during the month/quarter and include updated cumulative measures and “S” curves, as well as highlighting issues and decisions needed from the PMU; (iii) an annual validation assessment by the IVA to audit the DLI achievements; and, (iv) a Mid-term Review by the Bank after two years. There are several existing M&E processes already being used within the sector at the operating level, such as the Monitoring, Analysis and Reporting System (MARS) used by the WSCs to report their performance to HCWW and which covers the 16 WSC KPIs, and the Annual Information Reports (AIR) prepared by EWRA which cover the numerous KPIs of WSC performance measured by EWRA. The results M&E of this PforR will leverage as far as possible the use of existing KPIs of MARS and AIR in order to avoid creating new indicators that are laborious to track and evaluate.

77. ***A considerable amount of M&E capacity will be provided under the Program, including the setting up of a new PMU with a prime function of M&E, the procurement of ISCs under the loan to support both the PMU and the WSCs, including carrying out most of the M&E activities, and provision of an IVA.*** The PMU will support the WSCs by measuring progress appropriately by using the M&E system described above, and will collate the results to assess progress towards achieving the DLIs. The results across the Program region will be aggregated as the basis for

meeting the DLIs. Once satisfied with the accuracy of the reporting, the PMU will present evidence of the DLI achievement to the IVA, which is tasked with verifying the results. In order to validate the disbursement request submitted by the PMU, the IVA will verify all DLI target indicators through a desk review and physical inspection.

C. Disbursement Arrangements and Verification Protocols

78. *Disbursement arrangements of the Program. Disbursements will be made based on verified results, as measured by DLIs. For each DLI, allocated amounts, baselines, yearly targets, requirements of achievement, advance payments, prior results financing, deadlines for achievement, and determination of the amount to be disbursed have been defined.* Details of the disbursement modalities are provided in Annex 3. GoE will have to demonstrate through its regularly prepared financial statements that the total of the Program's net expenditures are equal to or in excess of the amount of the Bank's Program financing by the end of the Operation. The Program Financial Statements will be audited annually. Prior Results Financing amounting to US\$20 million is envisaged for this Operation. It is also expected that there will be advances of up to US\$137.5 million (25 percent of the US\$550 million PforR financing) to ensure that the activities are implemented in a timely manner. The amount of the advances and the specific DLIs to which the advance relate will be indicated in each Withdrawal Application. The Disbursement Deadline Date will be six months after the closing date stated in the Loan Agreement.

79. *Verification protocols of the Program.* The IVA will be a private firm of international reputation and with a strong local presence competitively selected by the GoE based on Terms of Reference acceptable to the Bank. The IVA might need to develop a joint venture with other firms, but will be ultimately held accountable for the IVA reports. Therefore, its reputation and track record would be key elements for the selection of the IVA. In order to be selected, the IVA will need to demonstrate ability to review DLIs under all the three Results Areas, from financial management, to operations, WSCs performance, and citizen engagement. The draft verification reports will be submitted for review by the IVA simultaneously to the PMU and the Bank, and neither party can modify such reports except to correct factual errors. The Program's results will be consolidated and submitted by the PMU based on the results reported by the WSCs/HCWW/ISCs/EWRA (for the DLIs under Results Areas 1 and 2) and by the PMU itself (for the DLIs under Results Areas 3) through the strengthened M&E system. The verification protocols for each DLI are presented in Annex 3. The Bank will also review compliance with the DLI targets during implementation support missions, and for disbursement purposes; the Bank will make the final decision on whether DLIs have been achieved, as provided for in Bank Policy (BP) 9.00, *Program-for-Results Financing*.

IV. ASSESSMENT SUMMARY

A. Technical

80. *Strategic Relevance.* The rural sanitation problem in the Delta region of Egypt is particularly daunting and deserves close attention because of the very dense housing structure, high population growth, and rising groundwater table resulting from year-round irrigation. Wastewater and sludge are dumped into the nearest water bodies (such as drainage and irrigation canals), and onto agricultural fields, as well as inside the premises of houses, thus posing significant health burdens, environmental damage (including contamination of groundwater), and

economic losses. This Program is strategically relevant to Egypt's economic development given the acute sanitation problems in the Nile Delta, and the Nile's central role in the economy, culture, and history of Egypt. The Program will have lasting impacts on health, the environment, economic externalities, and public benefits.

81. ***Concerns with the current service delivery model.*** At the core of many problems in the water and sanitation sector, especially infrastructure delivery, is the centralized model of decision-making for infrastructure investment, which favors large national organizations, and the separation of infrastructure investment, construction, and rehabilitation of the systems, from management, operation, and maintenance of the systems. The Program aims to provide the incentives and tools to all the key stakeholders – WSCs, HCWW, PMU/MHUUC, and EWRA – to revise the service delivery model and align investment planning and execution with operations and maintenance, and to reduce costs and deliver improved services.

82. ***Technical Soundness.*** The Program is assessed as technically sound. The GoE has developed a rural sanitation strategy based on reaping economies of scale for wastewater treatment systems by clustering villages. Detailed Master Plans at the level of the governorates must be updated by WSCs, including prioritization criteria, detailed costing, and technologies. A pipeline of detailed projects should be further prepared based on these Master Plans. The PforR also addresses another crucial area - the conformity of Water and Wastewater facilities in subsidiary companies to Egyptian laws, regulations, and codes, and to management requirements (including human resources, occupational health and safety, operations, maintenance, and quality assurance). The Program is expected to address some current technical weaknesses, including in project preparation, technologies selection, procurement, and contract management.

83. ***The three participating WSCs have the technical and managerial (that is governance) structures to support the Program, but improving the WSCs operational, managerial, and financial performance will be critical for sustainability.*** The Program addresses this by providing capacity building to the WSCs and by putting in place financial incentives for the transfer of funds to the WSCs based on assessment of their annual performance and the attainment of agreed-upon performance targets. For more details on WSC program data and performance, see Technical Assessment (Annex 4).

84. ***Some steps toward greater sector sustainability are underway. For example, EWRA has prepared a detailed tariff study and proposal for consideration by the Ministry.*** Increasing tariffs (alongside improving efficiency and therefore the operating ratio) is a critical element for the sustainability and eventual replicability of the Program. There has also been some progress on the amendment of codes of practice in the sector, but a comprehensive review is not yet complete. Specific aspects of a new rural sanitation strategy are being developed by an EU-financed consultancy managed by the HCW. This analysis will feed into the broader national strategy that will be developed by the MHUUC's new central unit, the PMU.

85. ***Institutional Arrangements and Governance Structures.*** Institutional arrangements and governance structures for the Program are assessed as adequate in all the participating WSCs. The PMU will be the lead agency for the PforR, but day-to-day implementation is delegated to the WSCs, which will be responsible for the majority of Activities under Results Area 1 (Improved Sanitation Access), although the HCWW and the MHUUC will play an important role. The WSCs and HCWW will both act as implementing agencies for Activities under Results Area 2 (Improved

Operational Systems and Practices of WSCs), and the MHUUC will act as executing agency for Activities under Results Area 3 (Strengthened National Sector Framework). WSCs and the PMU have committed to improving human resource planning, and to enacting appropriate policies to attract and retain talented staff that possess specific skills relevant to the sector (see Program Action Plan-PAP). The risks related specifically to the Institutional aspects of the Program are rated as “Substantial.”

86. **Results Framework.** Six DLIs have been identified that will provide a balance between providing incentives to promote the achievement of each results area and the need to ensure a reasonable cash flow for the implementation of the new sanitation infrastructure. The loan amount of US\$550 million will be spent on infrastructure implementation, with releases triggered by attainment of the DLIs. Results indicators include both DLIs and core sector indicators. The selection of IVA is critical for the credibility and operations of the Program and should be identified early, prior to implementation, especially since baseline information will need to be independently and credibly verified.

Economic Analysis

87. **The Program benefits and costs are evaluated from the society’s perspective, and as far as practicable, externalities are considered.** The investment costs depend on the technological options and approaches adopted to provide sanitation services to the target beneficiaries. Thus, the available unit-cost estimates are quite variable and uncertain. The costs generally range between US\$386 to US\$765 per capita, with an average of about US\$563 per capita. The O&M costs were assumed to be 3 percent of the estimated capital costs. The planned sanitation intervention in the Delta region has direct and indirect benefits. The range of possible benefits that are attributable to the program is extensive, but it is difficult, if not impossible to quantify the many benefits. Therefore, the present analysis focused on the valuation of private health and other benefits, public health benefits, and resource recovery and re-use benefits.¹⁰ The results of the economic analysis are summarized in [Table 5](#). The analysis was carried out considering three scenarios to enhance the robustness of the analysis and the emerging conclusions. The first Scenario (Column 1) considers only private benefits inclusive of the consumer surplus. The second Scenario (Column 2) considers private plus public benefits. The last scenario (Column 3) presents the total private plus quantifiable positive externalities, including resource recovery and re-use benefits.

Table 5: Summary Results of the Economic Analysis

Items	Private Benefits including Consumer Surplus	Private plus Public Benefits including Consumer Surplus	Private+ Public+ Resource Recovery and Reuse Benefits
Present Value of Benefits (US\$ Million)	402.1	550.9	662.8
Present Value of Costs (US\$ Millions)	380.7	380.7	380.7

¹⁰ Although it is difficult to quantify indirect benefits, some potential indirect benefits of this Program as identified by the Bank’s health sector team include, for example, benefits arising from the elimination of the wild form of polio virus with its subsequent cost savings in national anti-polio campaigns, decreasing the logistical costs incurred in having to respond to small-scale (village level) outbreaks of diarrheal disease and/or food poisoning, and decreased malnutrition in the adult population as a result of the decrease in heavy metal contamination of fisheries and agricultural products.

Net Present Value (US\$ Millions)	21.4	170.1	282.1
IRR (%)	13.1	20.6	25.5
Average Incremental Cost (US\$/m3)	1.09		
Average Willingness to Pay(US\$/m3)	1.115		
Average O&M cost (US\$/m3)	0.24		
Average Sewerage Tariff (US\$/m3)			
Ratio of ATIC to Prevailing Sewerage Tariff	28.7		
Ratio of Average O&M cost to prevailing sewerage tariff	6.35		
Ratio of Average Willingness to pay to Average Total Incremental Cost	1.022		

88. ***An incremental cost benefit analysis demonstrates that the Program’s economic impact is positive.*** The analysis employed incremental cost-benefit analysis based on the consumer surplus measurement method. The net benefits were derived by comparing the benefit streams with the program to the corresponding benefit streams without the program. The benefits were estimated based on the incremental sanitation service provided to the population hitherto unserved (about 833,000 people) valued through the prevailing official wastewater surcharge and consumer surplus. The consumer surplus resulted from the amount that the un-served people are currently willing to pay for a sanitation service (which is currently considered very high) and the amount they are expected to pay once they get access to the sanitation services delivered by the program. Cost reductions typically occur in sanitation services such as septic tank emptying. Those with access to informal on-site sanitation facilities currently consume lower quantities of water on a per capita basis, but pay significantly higher costs for sanitation service in comparison to those using informal sewer networks and those having access to public sewerage systems. In general, the unserved villagers pay 20 times more for sanitation services as compared to those with access to improved sanitation facilities.

89. ***The Program intervention approach is generally pro-poor.*** The PIAPs for each WSC will include pro-poor approaches such as phased payments, which would make household connections more affordable for the poor. Decentralized solutions have also been included in the Program, and are likely be used in satellite (more remote) areas to cater to possible preferences of poor and/or more remote communities. The tariff currently being considered by the GoE is also purported to have a pro-poor element by making initial consumption more affordable through cross-subsidies in which the first two consumption tiers are subsidized. These considerations are in addition to the analysis above, which argues that improving sanitation and providing lower cost options will benefit the poor directly and indirectly. It was noted in Section I that 21 percent of Egypt’s bottom 40 percent of the population is located in the rural Delta and 24 percent is located specifically within the geographic scope of the PforR in Beheira, Dakahliya, and Sharkiya.

90. ***While the economic viability of the Program (analyzing it from the society's point of view) is quite robust, the economic viability needs to be supplemented by operational and financial improvements on the part of the service provider and by a more sustainable tariff regime.*** The calculated surpluses and the estimated external benefits accrue mainly to other entities, rather than to the party responsible for operating and maintaining the sanitation system. For example, the average total incremental cost, which is a proxy for long-term average marginal economic cost, is 29 times higher than the prevailing sewerage tariff, and the average O&M cost is about six times higher. Ensuring the financial sustainability of the service will therefore require a combination of tariff increases, operational efficiencies, and some continued, but ideally decreasing, government support. Surveys indicate that the perceived value of water and sanitation services is significantly higher than the prevailing tariff, suggesting the social feasibility of upward tariff revisions.

B. Fiduciary

91. ***The main issues that were identified after reviewing all the procurement aspects associated with the Fiduciary System Assessment (FSA) are associated with the profile and quality of the consultants hired to prepare final designs and specifications and those hired for construction supervision, as well as the technical and financial qualifications of contractors who have a direct impact in the timeliness, cost, and quality of works.*** The review identified several issues that require addressing, including (i) the need for improvement of procurement practices; (ii) inconsistent interpretation and application of rules and procedures; (iii) insufficiently clear qualification, evaluation, and award criteria in the bidding documents used by the WSCs; and (iv) the lack of an independent protest mechanism other than an appeal to the Competent Authority.

92. ***Regarding financial flows, the PforR funds will be released to the General Treasury (specifically to the MHUUC account at the Central Bank) against DLIs agreed with the Government of Egypt.*** In parallel, MHUUC will finance the WSCs according to agreed-upon financing triggers, including MRs. Annual capital grants will be paid to WSCs in line with their approved capital investment plans. This will enable WSCs to initiate contracting using the capital grants they receive from MHUUC. This process is described in detail in Annex 5. *There is no independent complaints handling mechanism.* Although in Egypt the General Authority of Government Services (GAGS) and the office for contract monitoring in the MoF generally handle complaints, the WSCs, as state-owned enterprises (SOEs) are not covered. The FSA therefore recommends establishing a complaints-handling mechanism in the HCWW. Given that there are several entities responsible for addressing fraud and corruption issues in Egypt, the Bank's right to investigate involves drawing a covenant in the loan agreement.

93. ***The review also concluded that the WSCs have limited capacity for providing adequate contract administration and management.*** The WSCs have only been involved with network construction. Preparation of the designs and specifications, procurement and construction of sanitation systems has been the responsibility of NOPWASD. As such, the WSCs do not have in-house capacity. The ISC, with support from the PMCF, will address this gap.

94. ***Despite the financial stress encountered by WSCs, this Program should enable the WSCs to undertake an expanded role in implementing networks and treatment plants, with enhanced predictability of funding for investments and in strengthening institutional capacity.*** In parallel, the WSCs will commit to service delivery milestones, specific performance indicators, and the

linking of continued financing flows to progress and results, thus promoting accountability. In addition, the HCWW will provide technical assistance to WSCs on institutional strengthening to help them meet their KPIs, including operational and financial performance.

95. ***From a governance perspective, entrusting WSCs with implementing networks and treatment plants is envisaged as conducive to improved performance.*** By default, WSCs are responsible for service delivery, billing, and revenue collection. As such, they obviously have significant incentive to deliver in the most efficient manner. Increasing the number of connected customers would directly increase their revenues. Expedited implementation will mean earlier connection to the network and faster revenue generation and collection. Since WSCs are responsible for operations and maintenance, ensuring the quality of implemented works is in their best interest. This program will try to capitalize on the inherent incentive of WSCs and pursue a design that maximizes the program objectives.

Annex 5 provides a detailed description of the main risks and constraints identified by the FSA.

96. ***Actions required to address the risks.*** Actions necessary to address the identified weaknesses and constraints include to (i) develop and implement a procurement procedures manual and standard bidding documents to be adopted by the Sector, and provide training to WSC procurement staff on them; (ii) ensure that contracts are awarded only to bidders who demonstrate the minimum financial and technical qualifications; (iii) ensure that only technically qualified firms are selected to perform construction supervision; (iv) enforce Cabinet Decrees mandating the advertising of all bidding opportunities, bidding documents, bid evaluation results, and original and final contract amounts in the GoE e-portal: www.etenders.gov.eg; (v) agree on procurement performance indicators; (vi) improve procurement practices such as not allowing bidders to offer discounts after the bid due date, prohibiting price negotiations unless provided for and regulated through the bidding documents (BDs), requiring that bidders' qualifications (financial & technical) be verified prior to the contract award, reducing rebidding, and so forth; (vii) establish and implement a complaints mechanism with clear and simple procedures; (viii) establish a Quality Assurance Program to verify and ensure a satisfactory level of quality and completeness of designs, specifications and cost estimates; (ix) set up maximum lead times for transactions, approvals, and payments processing; (x) firm up arrangements that are undertaken by the different key players with respect to the flow of funds. (For a significant portion of the loan, annual capital grants will be disbursed by MHUUC to WSCs based on the latter fulfilling the eligibility requirements. WSCs' eligibility for the following year's capital grant will depend on the annual performance assessment conducted for each of the three WSCs.); (xi) establish a modern internal audit function in the WSCs, reporting to the Board through the Audit Committee, to contribute a systematic and disciplined approach to evaluating and improving the effectiveness of governance, risk management, and control processes; (xii) make annual financial reports publicly available through the website; and (xiii) ensure that the Program financial reports will be subject to audits by the Central Auditing Organization. Specific threshold amounts agreed with the GoE are described in Annex 5.

97. ***Based on the assessment findings, the measures that were identified to strengthen the fiduciary systems and address the gaps through DLIs, as well as in the Program Action Plan, will provide reasonable assurance that the funds will be used as intended in accordance with the Bank's PforR policy.*** Based on the expenditure program, no contracts in excess of the PforR policy exclusion limits have been identified. Based on the findings of the FSA and considering the

identified weaknesses and constraints, the overall fiduciary risk for the Program has been determined as “High.”

C. Environmental and Social Effects

98. *An Environmental and Social Systems Assessment (ESSA) was prepared according to OP 9.00.* The ESSA was developed based upon information reviews, field visits, consultations, and discussions with various Program entities and relevant stakeholders. The draft ESSA was disclosed to the public on May 18, 2015. The ESSA was prepared in wide consultation with large and diverse groups of stakeholders on the national and governorates levels. During January and February 2015, a number of consultation meetings and group discussions were conducted with groups of relevant teams from the HCWW, the WSCs, Community Development Associations (CDAs), community groups of men and women from the served and unserved villages, and natural leaders, as part of the preparation of the ESSA.¹¹ The consultations at this stage were designed to allow the ESSA team to obtain in-depth understanding of existing environmental and social systems (including land acquisition and community engagement). Public consultations events were conducted in April 2015 in each of the targeted Governorates with the objectives of presenting the draft findings of the ESSA, obtaining stakeholders’ comments and feedback, and incorporating the relevant comments in the final version of the ESSA. Participants in the three events consisted of more than 100 men and women of different relevant governmental organizations and civil society. The series of consultations allowed the ESSA team to capture the rich local experience of the communities, including poor rural households. The unserved communities spelled out their experiences related to the absence of appropriate sanitation systems. Among the priority issues of concern were specifically the impact on health of the family members, including impacts on children’s and women’s health. Specific impacts related to women’s exposure to heavy domestic work, the financial load on poor households, and the increased level of social tension among villagers due to unhealthy waste disposal practices were also deeply explored. The served communities were highly vocal on how improved sanitation systems helped families to attain financial savings, improved the level of household hygiene and cleanliness, and enhanced the whole living environment within the villages. Benefits to women and children were significantly highlighted in the discussions.

99. *Community and Village Stakeholder Consultations enabled the team to learn about the scale and severity of various impacts in unserved communities, including the need for an improved system, community willingness to provide various types of contributions (including land issues), and the communities’ recommendations for good planning for the program.* For the served communities, the consultations revolved around the benefits that could be attained from an improved sanitation system, how the project could be managed, the key lessons that could be learned, and the recommendations provided in the consultation sessions. Additional verification sessions were also conducted to verify the analysis of the ESSA team before finalizing the draft

¹¹ The main consultative activities conducted as part of the ESSA preparation could be summarized as: (a) consultative meetings with the HCWW and the WSCs. This involved meetings with around 40 staff members centrally and from the three governorates from various relevant departments; (b) consultative meetings for community members and other stakeholders from the served communities (a total of around 39 men and women participated from selected villages in the three governorates); and (c) consultations with community members and other stakeholders from the unserved communities. A total of about 32 men and women from selected villages in the three governorates participated in these consultations during the ESSA preparation.

report.¹² The ESSA was updated to reflect recommendations from the consultations, and the final version was disclosed locally and on the World Bank's website. See Annex 6 for details on the ESSA and the consultations conducted to date.

100. ***A preliminary risk assessment has been carried out using the Environmental and Social Risk Screening Format included in OP 9.00, and the likely environmental and social effects have been addressed.*** Regarding the context, the Program will be implemented in those rural areas with health, economic, and psychological pressures, and where there are polluted watercourses in the downstream of the Nile, and the interventions are expected to effectively address these geographic shortcomings. No sensitive habitats are located within the Program areas, and the risk on culturally valuable sites is low. In terms of sustainability, the Program is expected to enhance the sustainability of watercourses by enhancing their quality, and by enhancing the sustainability of agriculture lands by alleviating the rising groundwater table problems and improving the quality of irrigation water. In terms of institutional complexity, the environmental and social issues will be handled through different bodies under the umbrella of MHUUC, and the system is expected to operate without complexity. Although institutional capacity is currently limited, the PAP identifies measures for improving this capacity. There are no governance or corruption risks associated with the environmental aspects of the Program. The environmental risks have been rated "Moderate" and the social risks have been rated "Substantial."

101. ***Environmental aspects under the Program.*** The overall environmental impact of the Program is expected to be positive. The Program will allow, according to the standards of Law 48/1982, for the adequate collection and treatment of a considerable amount of sewage, which was, prior to the Program, being inadequately collected and discharged to watercourses with inappropriate or no treatment. The assessment indicates that none of the Program interventions would cause significant adverse environmental impacts that are sensitive, diverse, and unprecedented, or with an area of influence effectively exceeding the footprint of the Program facilities. The environmental risks of the Program are generally considered of Moderate significance, although some specific risks, such as sludge handling and treatment and institutional capacity, were rated "Substantial." The primary environmental risks are related to the following items: handling and treatment of sludge; handling of solid wastes separated at the screens of WWTPs and Pumping Stations (PSs), and the grit separated at WWTPs; discharging noncompliant effluent; safety risks in handling chlorine and other hazardous substances; dewatering operations during construction which possibly affect neighboring structures and lands; and the risks of handling chance-finds of culturally valuable objects. The identified environmental impacts of the Program are of relatively low significance, including changing the land use of the footprints of the WWTPs and PSs, temporary impacts during construction; impacts on drains receiving treated effluent, and lands receiving sludge and solid wastes. The PAP has been prepared according to the findings of the system assessment and gap identification, and includes measures to minimize the risks and mitigate the impacts.

¹² For verification purposes, two verifications sessions were conducted. The first verification session was conducted on February 26, 2015 with the team of the Public Awareness and Customer Service Department in HCWW to verify the findings related to community engagement and Hotline dimensions. A second session was conducted on March 23, 2015 with the PMU, HCWW, and WSCs (departments of public relations, properties, health and safety and labs). The findings from these verification activities were incorporated in the draft ESSA.

102. ***Social Aspects under the Program.*** The social risk to the Program is considered to be "Substantial" due to the complexity and risks associated with land acquisition, which is a core requirement for establishing the WWTP and pumping stations. The ESSA identified a wide range of benefits that the Program will deliver to targeted communities, including the following: economic savings at household level; health and safety benefits; creation of an enabling environment for community development at the village level; an enhanced level of public hygiene awareness; and special returns and benefits for women and children. However, a number of potential negative impacts and risks were also identified.

103. ***Risks Identified with Land Acquisition.*** One particular area of risk for the program involves the acquisition of land necessary for constructing the pumping stations and the WWTP. If not handled carefully, land acquisition could result in serious impacts on landowners and users. At this stage, since selection of specific investments has not been completed, it is difficult to know the exact amount of land that will be needed. Consequently, it is difficult to estimate either the number of landowners and/or users who would be affected by the land acquisition process, or the severity of the impact of land expropriation on them and their families. Despite the lack of specific details related to land acquisition needs at this stage of the Program, the ESSA greatly underscored land acquisition as a key cause of potentially negative social impacts and social risks if not handled carefully. In view of the seriousness of the land acquisition issue, a number of measures were included in the PAP and DLIs to address the subject, and key identified risks were categorized as either "land-related risks" or "other risks." The most important of the land-related risks are the following: (i) the limited capacities of the WSCs to manage land issues; (ii) the potential delay in the scheduled timeframe as a result of land acquisition; (iii) the lack of a consistent and transparent approach to managing some of the land acquisition aspects; and (iv) the livelihood risks related to land acquisition. In the cases where land acquisition was completed before the Program began, some additional risks related to drawbacks associated with land transactions may emerge, such as problems in the valuation of land, multiple owners, illegal users, delays in making payments, coercion, and so forth.

104. ***Other Social Risks Identified.*** In the second category of "other risks", and on the level of other social aspects involved in the Program, a number of risks were identified, of which the most important were: (i) the risks of damages associated with construction activities, (ii) a weak sense of demand or acceptance and readiness for projects in certain communities; (iii) risks of social tensions as a result of the exclusion of certain villages; (iv) risks related to the inability of poor households to afford the costs of the connections; and (v) risks related to potential escalation of unresolved community concerns or complaints arising from the absence of a structured proactive consultation system and/or a the lack of a robust grievance system at the village level, specifically during the planning and construction phases.

105. ***Legal and Regulatory Framework Gaps.*** The analysis of the systems to handle social issues and "other" risks revealed a number of gaps related to the legal and regulatory framework as well as to the institutional arrangements for addressing these issues. Some of these "identified gaps" concern individuals affected by the land acquisition legal framework. These include: (i) no provisions for consultations with affected individuals; (ii) the absence of certain sub-groups among those who are legally entitled (such as squatters and tenants); (iii) the absence of proactive local-level mechanisms for handling grievances; (iv) inconsistency and lack of clear standards for the land-valuation process; and (v) the absence of important principles, such as compensation for replacement costs, which could lead to serious negative social implications. As for institutional

arrangements and the capacity to handle land-related issues, the ESSA identified the substantial lack of capacity to deal with social impacts related to land acquisition as a key risk and threat. There is also no designated inter-agency coordination role for facilitating the process of obtaining approvals, which can result in delays in the delivery of challenging projects. In addition, there is a potential shortage of human resources to handle land acquisition issues in a more diligent and transparent manner.

106. ***Positive Social Issue Aspects.*** On the brighter side, the institutional and capacity assessment of the WSCs in relation to community engagement and social issues revealed a number of positive aspects, most importantly including: (i) the availability of teams at the WSC level (centrally on the governorate) to handle issues related to raising awareness levels; (ii) the setting and implementing agreed annual work plans; (iii) the existence of a M&E system to measure WSC performance; and (iv) the availability of awareness and communication guidelines that the teams are already using.

107. ***WSC Deficiencies to be corrected.*** The analysis also showed that the main orientation of the WSCs is project operation and maintenance, and that there is a resulting absence of mandates and capacities to deal with community engagement issues during the preparation, planning, design, and construction of projects. For example, there is, in general an unfair distribution of staff, as well as a shortage of human resources on the Markaz and village level. The responsibilities of the current staff overlap with public relations mandates. There are obvious deficiencies in the monitoring system and substantial shortages of resources for logistical support. Meanwhile, the analysis of the existing Grievance Redress Mechanism (GRM) revealed that one key shortfall of the existing mechanism is the fact that it does not cover issues related to project planning, design, and construction (for example, issues related to potential construction damage to land or houses during a project, and issues associated with land acquisition). The system also lacks technology utilization and is not fully automated. There appears to be heavier use of and reliance on informal channels, which are untracked. In general, there is no clear time interval for resolving complaints. Measures for dealing with the gaps identified related to land acquisition and to community engagement in general have been included in the PAP, as presented in Annex 8.

108. ***Environmental and Social Aspects of the Program Action Plan.*** In addition, a detailed Program Action Plan (PAP) was prepared (see Annex 8 for the environmental and social aspects of the PAP). The PAP aims to enhance the existing environmental and social management systems of the executing agencies by focusing on two major objectives: (i) developing a standardized approach to land acquisition, and (ii) enhancing the systems for engaging with communities and addressing community social risks. The goal of the first objective, land acquisition, is to ensure that land acquisition is handled with a consistent approach that includes proper consultation and disclosure in order to reduce any potential social strife, conflict, or impacts on livelihoods resulting from land acquisition. Methods to achieve this include developing a Standard Operating Procedure (SOP) for managing land acquisition, issuing a Memorandum of Understanding (MoU) to relevant line ministers to mainstream the land acquisition process, and assigning the relevant teams and building their capacities. Under the second objective, community and social risk engagement, available methods include the following: supporting the WSCs in developing a “Procedural Guidelines for Community Engagement”; strengthening the GRM establishing a strategy for ongoing consultation and transparent information sharing; establishing a pro-poor strategy to support poor households in accessing the program; enhancing the M&E systems, and assigning appropriate staff to handle community engagement. Regarding the latter,

special efforts should be undertaken to build staff capacity in various specific dimensions, including (i) improving the capacity of the WSC to undertake effective environmental assessment and management; (ii) initiating new procedures for control of sludge quality, control of effluent quality, solid waste management, upgrading health and safety aspects, and documentation of environmental registers; (iii) improving supervision of construction activities to ensure compliance with site-specific environmental requirements; and (iv) preparing operation manuals to standardize environmental measures in the operation of sanitation facilities.

D. Integrated Risk Assessment Summary

1. Integrated Risk Assessment Summary

Risk	Rating
Technical	Substantial
Fiduciary	High
Environmental and Social	Substantial
Disbursement Linked Indicator	Substantial
Overall Risk	Substantial

2. Risk Rating Explanation

109. *The Program is proposing substantial revisions to the existing service-delivery mechanism.* Therefore, the overall risk is seen as “Substantial.” Most risks are identified as “Substantial,” except for Fiduciary Risk, which is rated as “High,” given the use of country systems in particular for procurement and given the performance-based fiscal transfer mechanism that is being piloted. Environmental and Social Risks are rated as “Substantial,” although Environmental Risks alone are rated as “Moderate” (see Annex 7). Social risks are rated as “Substantial” because of past land acquisition issues, although this Program has attempted to put in place measures to help mitigate this risk. Although the GoE is supportive, risks need to be mitigated because restructuring takes time and must be managed incrementally. In sum, awareness needs to be increased on the part of all stakeholders to enhance their ownership of the broad changes, capacities need enhancing in order to ensure that key stakeholders are able to play their respective roles most effectively, and respective risk mitigation measures as suggested by the individual assessments need to be put in place.

Annex 1: Detailed Program Description

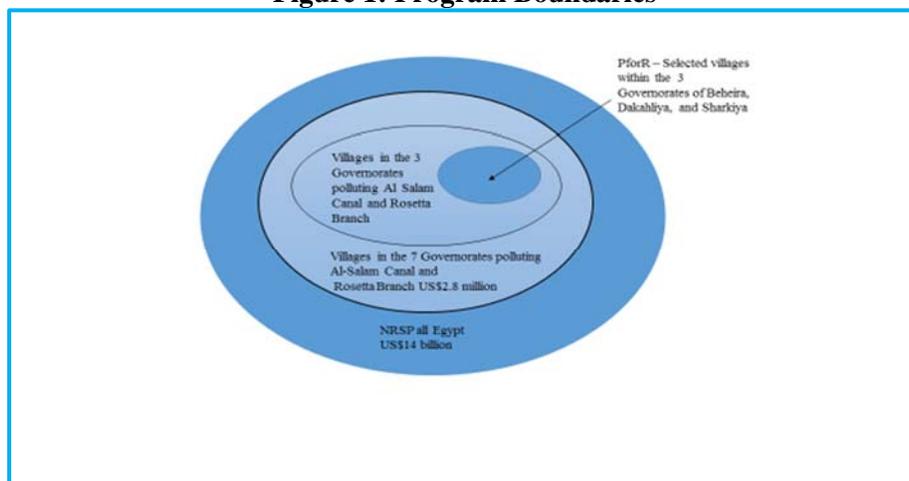
A. Program Scope

1. *The Sustainable Rural Sanitation Services Program for Results (the “Program”) is a results-based program supported by the World Bank aimed at strengthening institutions and systems to provide greater access and improved service delivery of rural sanitation services in targeted governorates.* The Program is embedded in the Government’s National Rural Sanitation Program described above, and it will also pilot further institutional strengthening that is intended to be scaled-up eventually in other governorates of Egypt. The Program aims to reduce poverty and enhance shared prosperity in a sustainable manner by providing access and improved services in rural villages and satellites, which have often been excluded from basic sanitation service provision in the past. This will be accomplished through new sanitation connections (mostly but not exclusively to sewerage systems) which will involve improved wastewater collection, treatment, and management. In order to do this most effectively, the Program reconsiders the existing service delivery model.

2. *The Program builds on the Government’s decision to shift from a centralized model of service delivery to a decentralized model that empowers the WSCs to improve service provision.* For the Program, the Government has made the strategic choice to pilot a system of fiscal transfers of performance-based capital grants (PBCG) to strengthen accountability and transparency at the local utility level for the delivery of rural sanitation services in three governorates. Disbursements of the PBCG are linked to an incentive regime of APAs that will be designed and implemented on a transparent and predictable basis centered on a formula taking into account Operational, Financial, Institutional, and Citizen Engagement dimensions described in more detail below.

3. *The Program focuses on the three WSCs operating in the governorates of Beheira, Dakahliya, and Sharkiya respectively because of the impact on reducing poverty and enhancing shared prosperity due to the high costs and health and environmental impacts related to current modes (or lack thereof) for provision of sanitation services provision in these areas.* By prioritizing rural sanitation services in these governorates in the Nile Delta, the Program will also contribute to reducing the pollution resulting from untreated or inadequately-treated wastewater discharges into the Al Salam and Rosetta Branch waterways as well as the high incidence of acute outbreaks of contamination in drinking water systems. There is therefore a strong environmental and public health rationale for choosing these three governorates. Furthermore, since Lower Egypt accounts for a total of 53 percent of Egypt’s total rural poor, a well-designed intervention in the sanitation sector could have a real impact in terms of poverty alleviation (see economic analysis of the Technical Assessment). For example, the current lack of adequate sanitation services in the rural villages of Lower Egypt has a substantial impact on average disposable income because of the significant costs of emptying septic tanks due to the high groundwater table levels along the Nile Delta together with additional costs related to damages incurred by using these septic tanks. As a result, the rural poor in Lower Egypt pay monthly costs of up to twice those paid in Upper Egypt.

Figure 1: Program Boundaries



B. Program Activities

4. **Scope of the Program.** The duration of the Program will be five years, with an expected start date of May 19, 2015 and targeted completion in October 2020. Due to the current financing that has been identified, and the ultimate magnitude of investments required, the Program focuses on a subset of villages within the three (3) governorates for investments related to increased access (see the smallest circle within the Figure above). However, the broader program of service improvements and national sector enhancements are more wide reaching. The bulk of the Program financing will be used to finance annual capital grants to the three WSCs to undertake rural sanitation infrastructure investments in accordance with their Master Plans and Annual Plans (Results Area 1). The remainder of the resources will be used for strengthening performance and institutional capacities of WSCs (Results Area 2), and for strengthening the national institutional framework (Results Area 3).

5. **The Program Activities are described below through three Key Result Areas:** 1) Improved Sanitation Access; 2) Improved Operational Systems and Practices of WSCs; and 3) Strengthened National Sector Framework, and the scope of each Results Area is summarized in [Table 1](#) below.

Table 1: Scope of Results Area

EXPECTED RESULTS	GEOGRAPHIC SCOPE
Results Area 1: Improved Sanitation Access	
About 167,000 new households (about 833,000 people) connected to working sanitation systems in villages and satellites in the three governorates in the Program area	Targeted Villages and Satellites
Results Area 2: Improved Operational Systems and Practices of WSCs	
Improved capacity, investment planning, operations and general service delivery of each of the three participating WSCs (Beheira, Dakahlia, and Sharkiya)	Three WSCs in the three Governorates
Results Area 3: Strengthened National Sector Framework	
Improved enabling environment for more sustainable rural sanitation services	Rural Egypt

1) Activities Within Results Area 1: Improved Sanitation Access

6. ***The Program is structured to incentivize the provision of access to sanitation to about 833,000 people living in the three governorates of Beheira, Dakahliya, and Sharkiya, with each governorate serviced by a separate WSC.*** Improved access is determined by a connection to a sewer network that is linked to a wastewater treatment facility meeting Egyptian treatment standards, or to any other acceptable sanitation solution (including decentralized systems). The Program targets about 167,000 new connections, or approximately 833,000 people living in unserved villages that routinely discharge their sewerage into the Nile River system, as well as the satellites¹³ around them in the defined Program area of the three governorates. The unserved villages and their satellites are considered first priority as determined in the Master Plans, and the selection of villages within the Program area remains flexible. This new HH connections target fits within the budget of about US\$500 million available for capital investments. The Household is defined as people served by a single water connection within the Program area. In addition, the disbursement is linked to the completion of final designs and the achievement of new HH connections in each year in villages and satellites to working sanitation systems for all three WSCs during the Program duration. More details are provided in Annex 3.

7. ***The Program will support decentralized sanitation systems for poorer or more remote households, and supports a pro-poor and inclusive strategy.*** The Program provides incentives to the WSCs to reach out to “satellites” (areas generally on the outskirts of the main villages). People living in satellites are often most excluded from basic services since their homes are difficult to reach through a sewer connection, both from an engineering and cost perspective. These satellites can however also be served with more cost effective decentralized solutions. Therefore, an additional disbursement-linked incentive is included under Results Area 1 for the WSCs to make additional efforts to reach out to these oft-excluded beneficiaries. Pro-poor measures (e.g. phased payments of household connection fees) will be further explored and initiated through the PIAP and the National Rural Sanitation Strategy (Results Areas 2 and 3).

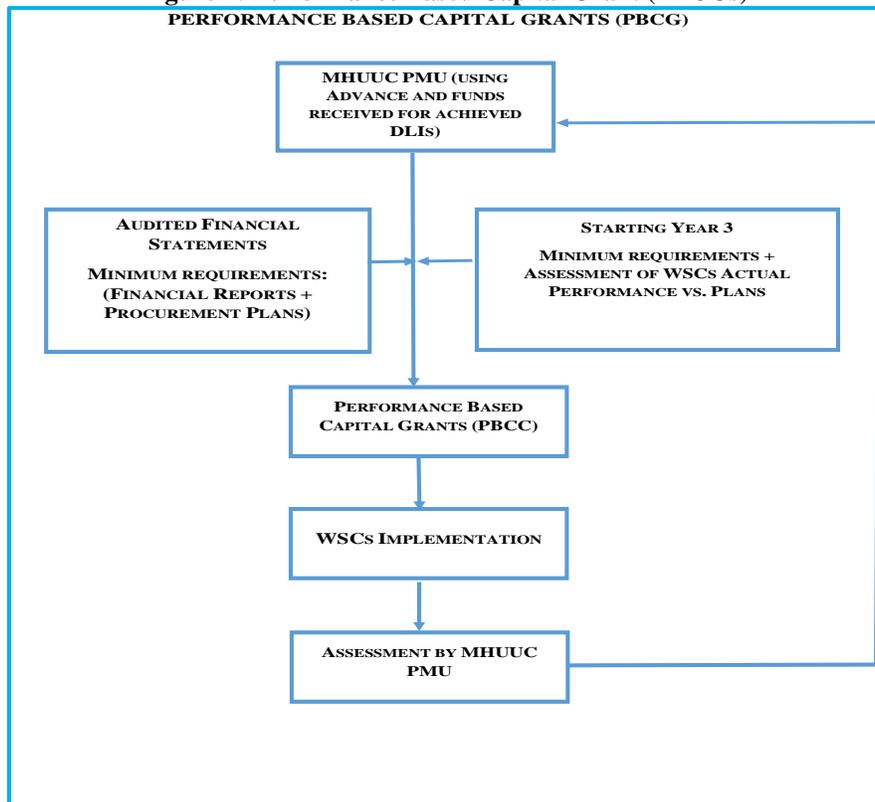
8. ***In order to ensure that increased access supported through this Results Area is linked to more sustainable service delivery, the Program will put in place a system of Performance Based Capital Grants (PBCG) from the Central Government to the WSCs to support priority rural sanitation investments identified through the Five Year Plans and included in the Annual Capital Investment Plan of the WSCs.*** The PBCG are defined as Fiscal Transfers from the Central Government that flow to WSCs annually providing they meet certain eligibility requirements described in the POM. It should be noted that the introduction of the PBCG system would be a key contribution of this program since it would promote a culture of transparency and accountability in the fiscal transfers system. It would be the first such system of fiscal transfers in Egypt for local service delivery. Experience in the United States and other OECD countries, has shown the value of using multiyear projections dependent on meeting performance standards. The revolving funds programs for water and wastewater in individual states in the United States provide good examples of the use of this system.

9. ***The performance-based capital grants will be allocated to the WSCs on a per capita basis and will be determined by the ability of the WSC to meet the performance standards set by the MHUUC and measured through a set of MRs and performance targets with increasing levels***

¹³ Satellites are defined as small villages in area and population numbers. In most cases, a satellite is one village and some farms and hamlets affiliated thereto (Source: Central Agency for Public Mobilization and Statistics (CAPMAS) 2014)).

of ambition throughout the implementation of the Program. The Program will start with a base grant allocation for the first two years that will be available to the WSCs providing the MRs are satisfied. The MRs would be both financial management related (i.e. audited financial statements submitted by the WSCs) as well as procurement related (i.e. percentage of contracts awarded and executed against estimates). These would be fiduciary measures put in place by GoE to ensure that it is comfortable with transferring base grants to the WSCs for each of the five years of the Program. From the third year onwards, in addition to the base grant, a performance-based grant will be provided to the WSCs based on their performance against the APAs in operational, financial, institutional, and citizen engagement areas. The PBCGs will be programmed into the National Budget annually and structured as unconditional fiscal transfers that will flow from the National Budget into the annual budget of the WSCs, which the WSCs can use to finance the investment projects prioritized in their annual capital investment plans. In the event any of the WSCs not receiving the performance top-up, this would be reallocated into the total grant pool available to the WSCs for investment (related to Results Area 1).

Figure 2: Performance Based Capital Grant (PBCGs)



10. *The WSCs can use the Performance Grant to finance a menu of investments included in their Annual Capital Investment Plans.* Infrastructure investments that are not economically, environmentally, or socially viable will not be financed with Program funds. Each Program sub-project will be screened by the WSC for its potential environmental and social impacts. Sub-projects that exceed standard thresholds for PforR operations will be excluded. The POM will detail the criteria and procedures for the prioritization and selection of subprojects to be included in the Annual Capital Investment Plan. A WSC that is unable to satisfy all the MRs will be ineligible to receive the annual capital grant for the forthcoming year. However, the funds remain assigned to the WSC’s account and will be reapporioned to it over the remaining years of the

Program. In the event the WSC fails to qualify for two consecutive years, the funds originally allocated to that WSC in the forthcoming year will be returned to the pool of funds to be used for allocation to the other WSCs.

11. *Below are some stylized fiscal transfer figures. It should be noted that these allocations are merely indicative and will be determined by the ability of the WSCs to achieve the MRs and the scores in the annual performance assessment.*

Figure 3: Fiscal Transfer Dakahliya



Figure 4: Fiscal Transfer Sharkiya

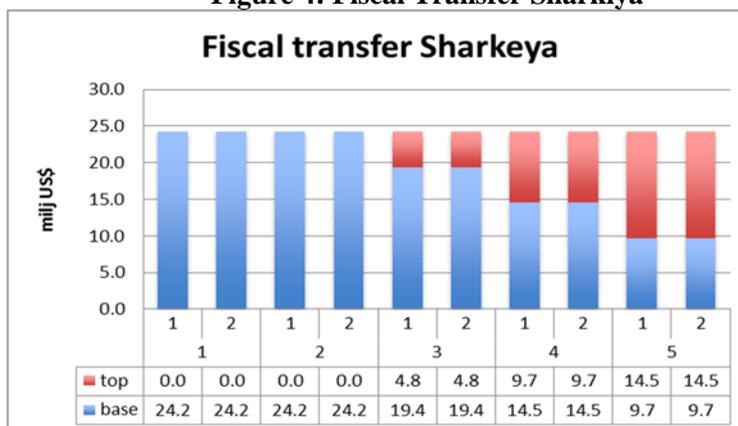
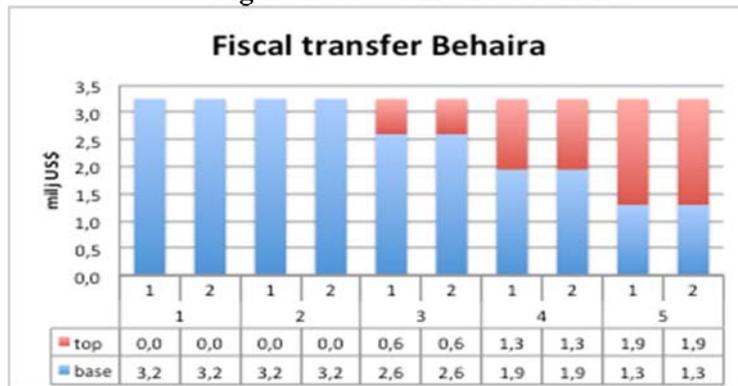


Figure 5: Fiscal Transfer Beheira



12. **Grant Cycle.** The allocation and disbursement of the PBCG will follow the Government's annual budget cycle and will provide incentives for efficient public expenditure management. The exercise will start on July 1 to coincide with the start of the fiscal year. Except for the first year of the Program (2015-2016), the Performance Grants will be programmed into the national budget and will be disbursed on a timely basis to the WSC within a specified time period at the start of the budget year. The assurance of timely and predictable funds from the Central Government will enable the WSCs to prepare realistic annual capital investment plans that are compatible with the available resource envelope. The annual performance grant cycle and the linking of the allocation and disbursement of the performance grant to the institutional and operational performance of the WSC provides the right incentives to ensure efficient and timely execution of the annual capital investment plans. This results-based approach, with the linking of Program financing to the achievement of specific indicators, provides the right incentives for the WSCs, as well as for central agencies such as MHUUC and HCWW, to coordinate their efforts to attain the PDO.

2) Activities within Results Area 2: Improved Operational Systems and Practices of WSCs

13. **Participating WSCs will be explicitly incentivized to improve investment planning, operations and maintenance, and service delivery through the compensation and reward mechanisms built into APAs.** APAs will be designed and implemented on a transparent manner centered on a formula taking into account four key dimensions: Operational, Financial, Institutional, and Citizen Engagement. The weights of the four categories will be approximately 25 percent each. These performance standards will relate to measures demonstrating performance, including for example:

14. **The APA Manual prepared by the EWRA/ independent consultant will define the threshold scores for each of the indicators of the four areas.** The EWRA will carry out the APA in accordance with the APA manual. The APA will assess the performance of the WSCs in terms of the following:

- Area 1 - Operational: comprising indicators that will include (1) wastewater treatment plants in compliance with Egyptian law and standards, and may include (2) O&M cost recovery and (3) septage management or related indicators.
- Area 2 - Financial: comprising of indicators that will include (1) Operating Ratio; and (2) Collection Efficiency.
- Area 3 – Institutional, addressing areas such as Efficient Procurement and Contract Management processes, as well as Financial Management processes such as internal controls and audit opinions:
 - Time to conclude each procurement process within 4 months;
 - Quantity of processes being retendered (less than 15 percent);
 - Less than 10 percent of contracts awarded on sole source basis;
 - Less than 15 percent of contracts subject to cost and/or time overruns (rounded down).
- Area 4 - Citizen engagement including the following achievements:
 - Complaints handling mechanism in place by Year 2;
 - Base-line for beneficiary feedback / citizen report card / satisfaction survey is established by Year 2;

- Procedural guidelines for community engagement are prepared by Year 1;
- Progress report on the implementation of the community guidelines is submitted by Year 3;
- Beneficiary feedback / citizen report card / satisfaction survey is conducted and the report submitted by Year 4;
- Over 50 percent of the received complaints/ grievances are responded to and processed by Year 5.

15. ***In order to show progress and improvements over time (years 3 through 5), WSCs will need to address the specific ‘problem’ areas that are identified in the surveys, otherwise they will not improve.*** Therefore, the PIAP will require the specific inclusion of an appropriate mechanism to assess and respond to the results.

16. ***By introducing concrete indicators on the operation and maintenance of the systems, as well as on citizen engagement, the Program intends to address key issues that currently undermine performance of the WSCs.*** As mentioned above, the Technical Assessment undertaken to inform the design of the Bank-financed Program states that the reform process initiated in 2004 has led to improvements, including the performance improvement of the WSCs. However, areas such as financial sustainability, procurement, contract management, and citizen engagement have been generally weak (and were critical obstacles for improved performance under the ISSIPs) and need to be strengthened. Results Area 2 aims to provide clear performance-based incentives in these areas.

17. ***Cost recovery will be one of the critical factors in determining the performance score of the respective WSC.*** The performance improvements put in place, as well as the APA score, will help support and incentivize each WSC to improve efficiency and reduce costs. Because the Program is structured as results-based, and therefore does not prescribe any specific technology (although in accordance with Egyptian standards), it is expected that unit costs should eventually decrease. Moreover, because the Program places investment-planning responsibility with the WSCs, it is expected that the WSCs, HCWW, and the MHUUC will strive for more cost-efficient solutions that would reduce operating costs by better aligning investment choices with feasible and efficient operating procedures. By placing the operating ratio in the APA formula, the WSC’s are given an explicit and transparent incentive to improve along these lines.

18. ***Accountability to citizens for greater voice and inclusion will form a critical pillar of the APA “formula” described above, as well as of performance improvements supported more broadly through the Program.*** Citizen engagement through citizen report cards/ beneficiary feedback surveys, awareness campaigns, community outreach guidelines, and strengthened communications systems of WSCs, and the development of a strategy for serving the poor, are all integral to the Program. They are incorporated either directly through results-based incentives (see DLI protocol), required measures (see the Program Action Plan (PAP), or through capacity-building programs (including WSP technical assistance). Engaging and including women will be an important element within the citizen engagement activities. Gender plays a key role in setting and shaping health and sanitation attitudes in the household, and therefore women must be at the center of concerns in order for any citizen engagement strategy to be successful (see sections on ESSA for further information on the role of women in the Program’s support for strengthening citizen engagement and inclusion). Overall, an important framework has been embedded in the operation to leverage client feedback, public availability of information on WSCs performance

and response to clients, and the role of the regulator and independent verification underpinning these processes.

19. ***EWRA is expected to play a critical role in the assessment of the WSCs performance.*** WSP support to EWRA will provide specific technical and financial resources for publication of WSCs performance and the establishment of a national benchmarking system for financial, operational and citizen engagement dimensions of the Program. EWRA will provide technical support for carrying out the APA process, in particular, measurement, benchmarking, and reporting.

20. ***In order for the WSCs to be able to deliver on the annual performance targets established in the APAs, they will need technical support, which is embodied in the PIAPs for addressing managerial and operational gaps and weaknesses.*** The PIAP would be similar to detailed business plans and would include measures to improve performance across the areas of the APA (operational, financial, institutional, and citizen engagement). In general, the PIAP would include, among other things: (i) the identification of gaps and weaknesses in the existing systems and processes of the WSCs with a focus on the areas measured under the annual performance assessment (APA); (ii) the development of modern management and financial systems; (iii) plans for improving all aspects of revenue administration, including billing systems, collection and administration of arrears, lowering the cost of revenue collection, and administration; (iv) plans for setting up non-revenue-water reduction programs; (v) plans for removing key deficiencies in water supply and wastewater management systems; (vi) strategies and measures for improved citizen engagement and consumer relations (including management of customers complaints and participation mechanisms); and (vii) a pro-poor strategy for each WSC to help identify the needs of poor households and the best options for ensuring sustained delivery (e.g., phased payments of household connection fees). The PIAP should specifically include the following for Citizen Engagement:

- ToRs to be developed by the PMU for some of the triggers, namely the community engagement survey and the beneficiary feedback.
- The GRM improvements should be made/developed based on clear analysis to identify the existing gaps and measures to strengthen the GRM system. Dissemination of the GRM should be made through appropriate communication channels in target areas
- The functionality of the GRM should be verified through indicators that look at the percentage of the complaints that have been responded to and handled.
- Citizen report cards results indicate improved responsiveness of WSCs to citizen's claims/grievances.

21. ***In addition to direct support through the Program for implementation of the PIAP, technical assistance will also be provided for upfront design and guidance, through the PMU and the HCWW (see institutional arrangements below).***

22. ***The Program therefore sets up a system of interlinked incentives and performance enhancement measures, which aim to test a new service delivery model that empowers local utilities to deliver improved services to beneficiaries.*** Through a well-designed and carefully implemented PIAP, the APA process will be informed and the WSCs will be strengthened to

achieve the requisite scores on the APAs, which will in turn determine the magnitude of the PBCG (fiscal transfers) from the GoE to the WSCs.

Figure 6: Program Elements Linked to Guide Institutional Performance Improvements



23. *In parallel with this operation, the WSP administered by the World Bank will complement the PforR lending operation with an initial US\$3.5 million technical support program during three years (starting in September 2015) to strengthen the capacity in particular of the HCWW, EWRA and the WSCs as they work to deliver improved sanitation services including to the poor.* The support provided by WSP will also aim at strengthening community-level citizen engagement and developing effective country systems for learning and knowledge sharing among rural sanitation stakeholders which can facilitate the scale-up of social and technological innovations developed by NGOs and other non-state actors. In addition to the program, the WSP support will contribute to the in-country sector coordination platform, which will be a strong tool to enable sharing of knowledge, increasing sector evidence-based decision making, and reaching consensus among Government, donors and other stakeholders in the sector. Through either the initial WSP TA or a future tranche, further effective service delivery models will also be explored, including the scope for engaging the private sector and communities, for example to improve septage management. Overall, a significant framework has been embedded in the operation to leverage client feedback, public availability of information on WSC performance and response to clients, and the role of the regulator and independent verification underpinning these processes.

3) Activities within Results Area 3: Strengthened National Sector Framework

24. *MHUUC will coordinate the Program activities for strengthening the enabling environment that will allow for more efficient and accountable rural sanitation service delivery and lend more fluidly to future scaling-up.* This includes: (i) development of a program for water and sanitation services that would enable cost recovery; (ii) the formulation of a revised National Rural Sanitation Strategy and the creation of a Central Unit (i.e. the PMU) which will be responsible for the coordination of the National Rural Sanitation Program and implementation of the Strategy; and (iii) finalization of the standard operating procedures for land acquisition. These measures are critical elements for the long-term sustainability of the sector. A series of consultations and citizen engagement will help embed these institutional changes more firmly into the sector. The PforR Program being implemented in the three governorates will in particular rely on these institutional changes to support the deeper changes in service delivery mechanisms being implemented, but these broader institutional strengthening and national strategy developments will also in turn enable replicability and scalability of the new service delivery mechanisms being piloted by the Program.

25. *The new water and wastewater tariff structure will constitute a first step towards a coherent national policy framework for setting—and linking—water and sanitation tariffs, subsidies, and cost-recovery goals.* By supporting the new water and wastewater tariff structure, the Program will contribute to the financial sustainability of the WSCs by allowing them to recover

operation and maintenance costs within five years of implementation. It will also support expanding affordable water and sanitation services for the poor, since the new structure includes cross-subsidies in which the first two consumption tiers (0 – 20 m³ per month; generally reflecting consumption levels of poor families) are subsidized.

26. ***The National Rural Sanitation Strategy will be spearheaded by the PMU.*** The Strategy will incorporate clear guidance and policy on service delivery models, infrastructure development, technologies selection, including more cost-effective approaches through the Code of Practice, pro-poor service delivery, financing, cost recovery, community and citizen engagement mechanisms, and private sector participation, among other key areas that would shape access and service delivery in the sector. The strategy will lay the groundwork for a future national scale-up of the institutional and service-delivery model being piloted through the Program in the three governorates of Beheira, Dakahliya, and Sharkiya. Work on the strategy, and related due diligence, will identify any potential obstacles to a broader decentralization process for the water and sanitation sector in rural Egypt, and will suggest ways to move forward for scaling up.

27. ***Through the introduction of Standard Operating Procedures for Land Acquisition for the rural sanitation sector, this Program aims to support measures that may have an impact on timely implementation.*** As described in Box 1 in Section I, issues surrounding land acquisition have played a large role in the rural sanitation sector in Egypt, and therefore the Program has provided measures to mitigate related risks. Such operating procedures will not only help ensure timely implementation of the Program, but will also form an important part of the enabling environment for scaling-up. The development of these procedures and related awareness raising will also help to strengthen communication and engagement among stakeholders.

28. ***The MHUUC will also undertake or commission relevant policy and analytical studies to inform the policy making process in the sector.*** Support will also be provided to the EWRA to enhance its capacity to build and sustain an effective regulatory and oversight framework. Additionally, support will be provided to oversight agencies, such as the Central Auditing Organization of Egypt, to conduct regular and timely financial audits of WSCs as well as to carry out performance audits of the Program under their mandate. The WSP will be carrying out a Public Expenditure Review (PER) in coordination with the Program. The findings of the PER will inform the broader sector policy dialogue within the GoE as well as between the GoE and the development partners in terms of policy choices and financing sustainability in the sector. With the decision of the GoE to move to a more decentralized model of service delivery, these policy and regulatory initiatives will set the stage for providing a strong enabling framework for empowering the WSCs to become efficient and accountable service-delivery institutions. This will also clarify the current overlap of institutional roles and responsibilities that act as a deterrent to clear institutional accountabilities.

C. Program Development Objective, Results, and DLIs

29. ***Program Development Objective (PDO): To strengthen institutions and policies for increasing access and improving rural sanitation services in the Governorates of Beheira, Dakahliya, and Sharkiya in Egypt.*** The PDO-level desired outcomes include (i) increased access demonstrated by the number of people provided with access to “improved sanitation facilities” under the program; (ii) Improved operational systems and practices of WSCs; and (iii) strengthened institutional arrangements demonstrated by the adoption of a revised National Rural Sanitation Strategy. The Results Indicators, including baseline, yearly targets, and verification

protocols, as well as the Results Chain of the Operation, are presented in further detail in Annexes 2 and 3.

30. **Key Results.** The key results that will be measured to analyze success in achieving the PDO will include, as stated above: (i) people provided with “improved sanitation facilities” under the Program; (ii) the design and implementation of the APA system to help improve investment planning and WSCs performance; and (iii) strengthened institutional arrangements demonstrated by a revised National Rural Sanitation Strategy. All relevant indicators are described in the table below:

Table 2: Results Framework Indicators: PDO Level Indicators and Intermediate Outcomes

<p><u>Results Area 1: Improved Sanitation Access</u></p> <ul style="list-style-type: none"> • Number of people, disaggregated by gender, provided with access to improved sanitation facilities under the Program (number) • Number of new functioning household connections made to working sanitation systems (number) • Percentage of new functioning household connections in satellite locations made to working sanitation systems
<p><u>Results Area 2: Improved Operational Systems and Practices of WSCs</u></p> <ul style="list-style-type: none"> • Annual Performance Improvement Action Plans for WSCs implemented • Operating ratio • Citizen’s engagement: complaints handling/ grievance mechanism operational • Citizen’s engagement: citizen report card/ baseline and follow-up survey undertaken • Procurement systems improved
<p><u>Results Area 3: Strengthened National Sector Framework.</u></p> <ul style="list-style-type: none"> • New National Tariff structure to allow for sustainable cost recovery approved • Central unit to coordinate Egypt’s National Rural Strategy established • Revised National Rural Sanitation Strategy adopted • Standard Operating Procedures on land acquisition for National Rural Sanitation Program issued

31. **The Results Chain.** The results chain is provided below, and the Results Framework and Monitoring is provided in Annex 2.

Figure 7: Results Area 1

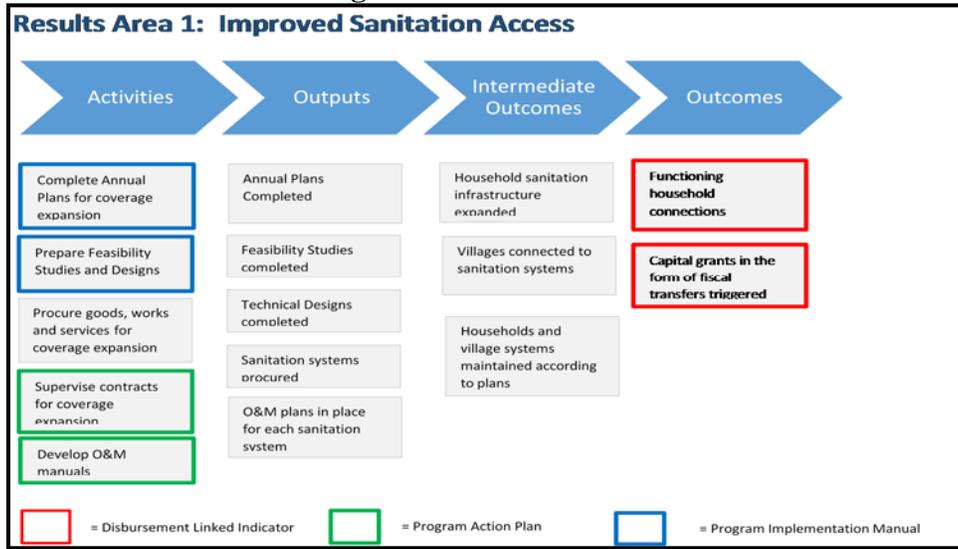


Figure 8: Results Area 2

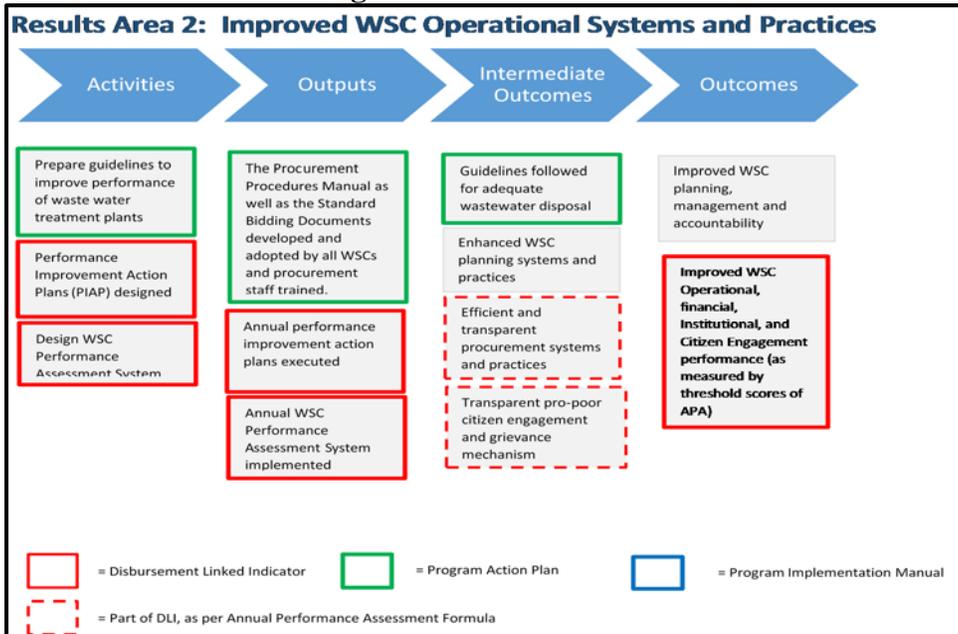
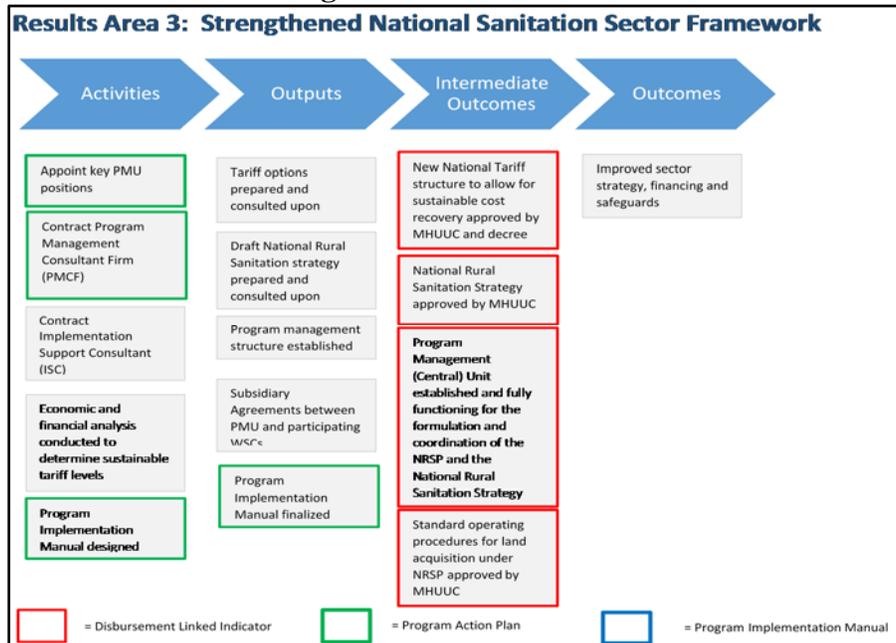
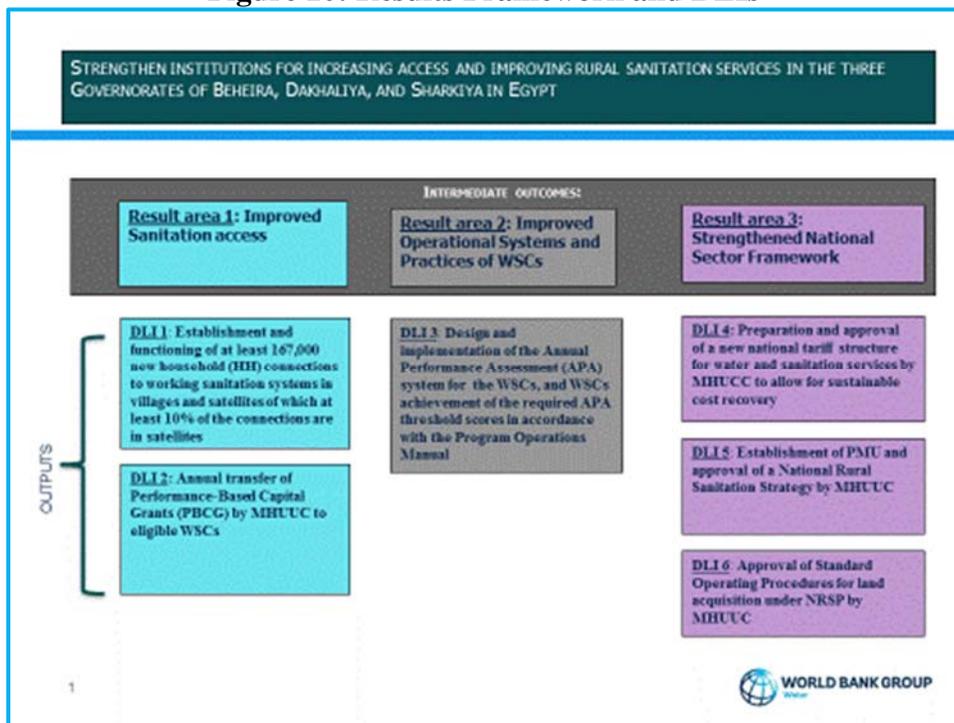


Figure 9: Results Area 3



32. *Disbursement Linked Indicators (DLIs) for this Program were developed with the GoE to most effectively meet the PDO.* The DLIs aim to provide the right incentives to the relevant stakeholders – PMU, HCWW, or the WSC – to achieve the required objectives. Six DLIs have been identified that will provide a balance between providing incentives to promote the achievement of each results area and the need to ensure a reasonable cash flow for the implementation of the new sanitation infrastructure. The results framework and DLIs are shown in the figure below:

Figure 10: Results Framework and DLIs



33. ***The DLIs listed under Results Area 1 relate to building and improving sanitation infrastructure, which will lead to improved access.*** When the GoE can demonstrate (through an IVA) that a certain number of connections, or satellites (which tend to be on average poorer than non-satellite villages) have been made, DLI 1 will be triggered. DLI 2 will be triggered when the Performance Grants (PG) allocated are disbursed promptly annually from the MHUCC to the eligible WSCs to help deliver on timely access improvements.

34. ***The DLI listed under Results Area 2 relate to incentivizing the operational practices of the WSCs to improve service delivery.*** DLI 3 relates to the improvement planning of the WSCs, and the annual performance action plans are to be designed and implemented to trigger the disbursement. Later DLRs are triggered when the APA system for the WSCs is designed and implemented and the WSCs have attained the required PA threshold Scores. The APA is based on the following areas of performance: Operational, Financial, Institutional, and Citizen Engagement. More detail is provided on this DLI in the Detailed Program Description in Annex 1 and in the DLI protocol and related tables (Annex 3).

35. ***The DLIs listed under Results Area 3 relate to strengthening the broader national institutional and policy framework for the sector.*** These DLIs are critical for not only the long-term sustainability of the improvements implemented through the Program in the three governorates, but also for the scaling-up and sustainability of the restructuring in the broader rural sanitation sector. DLI 4 relates to the adoption of a tariff structure that allows for greater cost recovery. This is essential for the financial viability of the WSCs and the financial sustainability of the sector. Tariff reforms are being reviewed by Government and are expected to be enacted in FY2016. DLI 5 relates to the strengthening of the National Rural Sanitation Strategy – in particular the creation of a Central Unit that will implement the NRSP, and the revision of the national rural strategy, an initiative to be led by the newly created Central Unit (i.e. “PMU”). By including a pro-poor focus, service delivery mechanisms, decentralization, community participation, appropriate technologies, cost recovery and financing principles, this strategy is expected to constitute a key policy instrument to scale up the Program to all governorates. In other words, the strategy will incorporate concrete actions to ensure technical, financial, environmental, and social sustainability of the Program. The strategy will be complementary to Results Area 2 that also supports activities at the WSC level in several of those dimensions. DLI 6 is to ensure better results for the environment and social protection through a wastewater facility code of practice and through standard operating procedures for land acquisition. The latter is important to ensure more efficient and equitable acquisition of land that may be required for new connections and the expansion of treatment facilities, including enhanced consultation and engagement with impacted communities.

36. ***The DLIs provide a balance between providing incentives to promote the achievement of each results area and the need to ensure a reasonable cash flow for the implementation of the new sanitation infrastructure.*** Table 3 summarizes the purpose and provides information on the definition and measurement of the DLIs.

Table 3: Disbursement Linked Indicators

DLI	Purpose	Definition & Measurement
Result Area 1 – Improved Sanitation Access		
DLI 1. Establishment and functioning of at least 167,000 new household (HH) connections to working sanitation systems in villages and satellites of which at least 10% of connections are in satellites	Major DLI that measures the increased access to sanitation. Satellites percentage helps ensure that smaller often poorer households are included.	Household means the people served by a single water connection. Working sanitation facility means that systems are operational and discharges in compliance with quality standards.
DLI 2. Annual transfer of Performance Based Capital Grants (PBCGs) by MHUUC to eligible WSCs	To enhance transparency and accountability and ensure the financial incentive for improved performance of the WSCs	PBCG are Fiscal Transfers from the Central Government that flow to WSCs annually providing certain requirements are satisfied, including performance indicators after the 3rd year of implementation.
Result Area 2 – Improved Operational Systems and Practices of WSCs		
DLI 3. Design and implementation of the Annual Performance Assessment (APA) system for WSCs, and WSCs achievement of the required APA threshold scores in accordance with the Program Operations Manual	The APA is based on a formula including improved operational and financial performance, institutional strengthening, and citizen engagement, based on (but not limited to) KPIs already used by the WSCs. The first year for this DLI focuses on the PIAPs for WSCs being designed.	The performance improvement system will use existing measures and tools such as TSM and KPIs but focus on problem areas, in particular procurement, pro-poor citizen engagement, and operating ratio.
Result Area 3 – Strengthened National Sector Framework		
DLI 4. Preparation and approval of a new national tariff structure for water and sanitation services by MHUUC to allow for sustainable cost recovery	Financial sustainability Foster affordability by the poor	EWRA will need to evaluate what are the appropriate tariff level for cost recovery in the WSCs and establish gradual increases throughout implementation of the Program.
DLI 5. Establishment of PMU and approval of a National Rural Sanitation Strategy by MHUUC	To ensure replicability and scaling up of the rural sanitation program to all governorates	To ensure sustainability and replicability of the program, the strategy will include service delivery, decentralization, citizen engagement, appropriate technologies, cost recovery, and financing principles.
DLI 6. Approval of Standard Operating Procedures for Land Acquisition under NRSP by MHUUC	To streamline the current complex process that involves many organizations.	Should include simplification of current regulations and mandates, not just documenting the current processes.

The complete DLI Matrix is provided in Annex 3.

Annex 2: Results Framework

Program Development Objective: To strengthen institutions and policies for increasing access and improving rural sanitation services in the Governorates of Beheira, Dakahliya and Sharkiya in Egypt.													
PDO Level Results Indicators	Core	DLI	Unit of Measure	Baseline	Target Values						Frequency	Data Source/Methodology	Responsibility for Data Collection
					June 2016	June 2017	June 2018	June 2019	June 2020	TOTAL			
1. People provided with access to “improved sanitation facilities” under the Program (number, gender disaggregated)	X		Number Percent age	0						833,000	Annual		
2. WSC Operating Ratio*				Beheira: TBD Dakhalia: TBD Sharkiya: TBD	TBD ¹⁴	TBD	TBD	TBD	TBD		Annual	IVA/EWRA	
3. Approval of a National Rural Sanitation Strategy by MHUUC		X	Yes/No	N	N	Y	Y	Y	Y	Y	1	IVA/PMU	
Results Area 1: Improved Sanitation Access													
Intermediate Level Results Indicators	Core	DLI	Unit of Measure	Baseline	Target Values						Frequency	Data Source/Methodology	Responsibility for Data Collection
					June 2016	June 2017	June 2018	June 2019	June 2020	TOTAL			
4. New functioning household connections to working sanitation systems (with percentage in satellite areas)		X	Number Percent age	Beheira: 0 Dakahliya: 0 Sharkiya: 0	0	10,000	40,000	50,000	67,000	167,000	Annual	IVA	

¹⁴ Baselines and targets will be verified and included in the results framework once they are determined as part of the PIAP/APA process, by the end of Year 1.

5. New household sewer connections constructed under the Program	X			Beheira: 0 Dakahlia: 0 Sharkiya: 0	0	9,000	36,000	45,000	60,000	150,000			IVA
Results Area 2: Improved Operational Systems and Practices of WSCs													
Intermediate Level Results Indicators	Core	DLI	Unit of Measure	Baseline	Target Values						Frequency	Data Source/Methodology	Responsibility for Data Collection
					June 2016	June 2017	June 2018	June 2019	June 2020	TOTAL			
6. Implementation of the Annual Performance Assessment (APA) system for the WSCs, and WSCs achievement of the required APA threshold scores		x	Yes/No	Beheira: N Dakahlia: N Sharkiya: N	N	Y	Y	Y	Y	Y	Annual		IVA/PMU
7. Citizen engagement (values disaggregated by gender where feasible)*		X (in defn)	Yes/No								Annual	Survey	IVA/TBD
a) Grievance mechanism functional				a) N	a) N	a) Y	a) Y	a) Y	a) Y	a) Y			
b) Beneficiary feedback / citizen report card / satisfaction survey undertaken				b) N	b) N	b) Y	b) Y	b) Y	b) Y	b) Y			
8. Develop and implement a procurement procedures manual and standard bidding documents		X (in defn)	Yes/No	Beheira: N Dakahlia: N Sharkiya: N	Y	Y	Y	Y	Y		1		

adopted by WSCs, including relevant training provided*.													
9. % of functioning waste water treatment plants in governorate operating to Egyptian standard*		X (in defn)		Beheira: TBD Dakahlia: TBD Sharkiya: TBD	TBD ¹⁵	TBD	TBD	TBD	TBD				IVA/EWR A
Results Area 3: Strengthened National Sector Framework													
Intermediate Level Results Indicators	Core	DLI	Unit of Measure	Baseline	Target Values					Frequency	Data Source/Methodology	Responsibility for Data Collection	
					June 2016	June 2017	June 2018	June 2019	June 2020				TOTAL
10. Preparation and approval of new national tariff structure for water and sanitation services by MHUUC to allow for sustainable cost recovery		X	Yes/No	No	N	Y	Y	Y	Y		1		
11. Creation of a PMU with a mandate for the formulation and coordination of NRSP and the National Rural Sanitation Strategy		X	Yes/No	No	Y	Y	Y	Y	Y		1		

¹⁵ Baselines and targets will be verified and included in the results framework once they are determined as part of the PIAP/APA process, by the end of Year 1

12. Approval of Standard Operating Procedures for land acquisition under NRSP by MHUUC		X	Yes/No	No	N	Y	Y	Y	Y				
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(*) Defined in DLI Protocol, Annex 3, as part of APA.

Annex 3: Disbursement-Linked Indicators, Verification Protocols and Disbursement Arrangements

Disbursement-Linked Indicator Matrix

	<i>Total Financing Allocated to DLI (US\$ m)</i>	<i>As % of Total Financing Amount</i>		<i>DLI Baseline</i>	<i>Indicative timeline for DLI achievement</i>					<i>2020</i>
					<i>2015 (Prior Results)</i>	<i>2016</i>	<i>2017</i>	<i>2018</i>	<i>2019</i>	
Result Area 1: Improved Sanitation Access										
DLI 1: Establishment and functioning of at least 167,000 new household (HH) connections to working sanitation systems in villages and satellites of which at least 10 percent of the connections are in satellites				0		1.1. Final designs completed for at least 25,000 connections	1.2.1 Final designs completed for at least 67,000 connections 1.2.2 10,000 New Household connections established.	1.3 Total of 40,000 New Household connections established in villages (cumulative connections 50,000)	1.4 Total of 50,000 New Household connections established in villages (cumulative connections 100,000).	1.5 Total of 67,000 New Household connections established in villages (Cumulative connections 167,000)
<u>Allocated amount:</u>	220	40%				15	24.45	46	57.5	77.05
DLI 2: Annual transfer of Performance Based Capital Grants (PBGC) by MHUCC to eligible WSCs				No	No	Yes	Yes	Yes	Yes	Yes
<u>Allocated amount:</u>	40	7%				8	8	8	8	8

Result Area 2: Improved Operational Systems and Practices of WSCs										
DLI 3: Design and implementation of the Annual Performance Assessment (APA) system for the WSCs, and WSCs achievement of the required APA threshold scores in accordance with the Program Operations Manual				None		3.1 PIAPs prepared for the three WSCs	3.2 A manual for carrying out the APA of the WSCs has been prepared and the first APA for each of the three WSCs has been carried out	3.3 Each WSC has achieved the minimum threshold APA scores in accordance with the manual and the Program Operations Manual	3.3 Each WSC has achieved the minimum threshold APA scores in accordance with the manual and the Program Operations Manual	3.3 Each WSC has achieved the minimum threshold APA scores in accordance with the manual and the Program Operations Manual
Allocated amount:	170	31%				15	20	45	45	45
Result Area 3: Strengthened National Sector Framework										
DLI 4: Preparation and approval of new national tariff structure for water and sanitation services by MHUUC to allow for sustainable cost recovery				None	4.1 New National Tariff Structure has been prepared by MHUUC		4.2 New National Tariff Structure has been approved by MHUUC and decree has been issued			
Allocated amount:	50	9%			10		40			
DLI 5: Establishment of PMU and approval of a National Rural Sanitation Strategy by MHUUC				None	5.1 PMU has been created with a mandate for the		5.2 National Rural Sanitation Strategy has been	Key Action Plans for implementing the National Rural Sanitation Strategy have been designed (not time-bound; expectation/modelled for Year 3)		

					formulation and coordination of NRSP and the National Rural Sanitation Strategy		approved by MHUUC			
<u>Allocated amount:</u>	50	9%			10		30	10 (not time-bound; expectation/modelled for Year 3)		
DLI6: Approval of Standard Operating Procedures for land acquisition under NRSP by MHUUC				No			Yes			
<u>Allocated amount:</u>	18.625	3%					18.625			
Total Financing Allocated:	548.625	100%			20	38	141.075	109	110.5	130.05

DLI Verification Protocol Table

#	DLI	Definition/ Description of achievement	Scalability of Disbursements (Yes/No)	Protocol to evaluate achievement of the DLI and data/result verification		
				Data source/agency	Verification Entity	Procedure
1	Establishment and functioning of at least 167,000 new household (HH) connections to working sanitation systems in villages and satellites of which at least 10% of the connections are in satellites	<p>Household is people served by a single water connection within the program area.</p> <p>DLI 1 relates to new household connections in villages or satellites to working sanitation systems as per the Egyptian Law or standards.</p> <p>A disbursement is therefore triggered when:</p> <p><u>Year 1</u>, Final designs required for at least 25,000 connections are completed.</p> <p><u>Year 2</u>, Final designs required for at least 67,000 new connections are completed;</p> <p><u>Year 2</u>, 10,000 new household connections are established.</p> <p><u>Year 2 to Year 5</u>, the cumulative number of new HH connections to working sanitation systems in villages and satellites. in each year is above the threshold established as follows:</p> <p><u>Year 2</u>: 2,000 new connections</p> <p><u>Year 3</u>: 8,000 new connections</p> <p><u>Year 4</u>: 10,000 new connections</p> <p><u>Year 5</u>: 13,400 new connections</p> <p>*Disbursement will only be triggered in any given year when at least the number of new HH connections mentioned above for the three WSCs combined are achieved.</p> <p>*Disbursement in Year 5 will only be triggered if 10% of the total new cumulative functioning connections are made in satellites.</p>	Yes (for HH connections)	MHUUC; reports from WSC; physical survey and inspection of sample connection	IVA to be contracted by GoE through the PMU	<p>IVA to ensure that:</p> <ul style="list-style-type: none"> - <u>Year 1</u>: Final design packages required for at least 15% of the total number of connections are completed per quality control procedures. - <u>Year 2</u>: Final design packages required for at least 40% of the total number of connections are completed per quality control procedures. <p><u>Year 2 to 5</u>: IVA to assess the number of new service or new amended water supply contracts (i.e. the service contract or amended water supply contract is signed between the WSC and the household)</p> <p>To assess the number of existing service contracts or amended water supply contracts connected to a sewage system improved from direct discharge to a system leading to wastewater treatment according to Egyptian law or standard.</p> <p>Carry out physical inspection of:</p> <ul style="list-style-type: none"> - a random sample of no less than 5% of new HH connections to working sanitation systems in villages for all WSCs - In year 5, a random sample of no less than 5% new HH connections in satellites to working sanitation systems for all WSCs.

2	Annual transfer of Performance Based Capital Grants (PBCG) by MHUCC to eligible WSCs	<p>DLI 2 will be triggered when PBCG are disbursed annually by the MHUCC to the eligible WSCs by the agreed upon time period (as established in the Program Operations Manual). PBCG are Fiscal Transfers from the Central Government that flow to WSCs annually upon the satisfaction of certain eligibility requirements described in the Program Operations Manual.</p>	No	MHUUC	IVA to be contracted by GoE through the PMU	<p><u>From Year 1 onwards</u>, the PMU will submit to the IVA with copy to the Bank, documentation showing the date of the annual disbursement of the PBCG by the MHUUC to the WSCs.</p> <p>The IVA will certify to the Bank that the disbursement of the PBCG is consistent with the provisions of the Directive/Report issued by the MHUUC and that the PBGC was disbursed by the MHUUC to the WSCs by the agreed upon date. The Program Operations Manual will include the guidelines for the Directive/Report to be issued by the MHUUC on the allocation and disbursement of the PBGC.</p>
3	Design and implementation of the Annual Performance Assessment (APA) system for WSCs, and WSCs achievement of the required APA threshold scores in accordance with the Program Operations Manual	<p>DLI 3 will be triggered when:</p> <p>Year 1: The PIAPs are prepared for the three WSCs. Year 2: APA Manual prepared and the first APA for each WSC carried out Year 3-5: Each WSC to achieve the minimum threshold APA scores</p> <p>The PIAPs would be similar to detailed business plans and comprise measures to improve performance across the areas of the APA and beyond, e.g. citizen engagement. Specifically, the PIAP should include the following for Area 4, Citizen Engagement:</p> <ul style="list-style-type: none"> • ToRs to be developed by the PMU for some of the triggers, namely the community engagement survey and the beneficiary feedback. • The GRM improvements should be made/developed based on clear analysis to identify the existing gaps and measures to strengthen the GRM system. Dissemination of the GRM should be made through appropriate communication channels in target areas • The functionality of the GRM should be verified through indicators that look at the percentage of the complaints that have been responded to and handled. 	No	MHUUC/PMU	IVA	<p><u>In Year 1</u>, the IVA reviews the Five Year PIAP to assess whether the PIAP has been prepared in accordance with the prescribed format in the Program Operations Manual. In Year 2 the IVA reviews the APA manual to ensure that the main indicators of the four areas are measured in the APA and weightages are used to determine the APA score.</p> <p>The EWRA will provide the IVA with a report on the APA process and the scoring for each WSC. For Years 2 to 5, the IVA will verify the achievement of the APA thresholds scores determined in the APA manual for each WSC. The HCWW will provide to IVA through the PMU the supporting documentation (i.e. the PIAP, the PA manual).</p> <p>For Area 4, Citizen Engagement, the IVA should verify through random sampling the percentage of complaints that have been responded to and handled, both</p>

	<ul style="list-style-type: none"> • Citizen report cards results indicate improved responsiveness of WSCs to citizen's claims/grievances. <p>The APA is based on a formula that includes operational, financial and institutional indicators for WSCs that help determine progress made on specified performance areas.</p> <p>The formula should weight all four areas equally (at 25% each).</p> <p>The APA Manual prepared by EWRA/ independent consultant will define the threshold scores for each of the indicators of the 4 areas. The EWRA will carry out the APA in accordance with APA manual.</p> <p>The APA will assess the performance of the WSCs on the following:</p> <ul style="list-style-type: none"> ➤ <u>Area 1</u> - Operational: comprising of indicators that shall include (1) percentage of functioning WWTP in compliance with the Egyptian law and standards and may include (2) O&M cost recovery and (3) septage management or related indicators. ➤ <u>Area 2</u> - Financial: comprising of indicators that shall include (1) Operating ratio and may include (2) Collection Efficiency or related indicators. ➤ <u>Area 3</u> – Institutional, that shall include indicators for efficient procurement processes: <ol style="list-style-type: none"> 1. The disbursement will be triggered when the following objectives are achieved: (i) Time to conclude each procurement process within 4 month; (ii) Quantity of processes being retendered (less than 15%); (iii) Less than 10% of contracts awarded on sole source basis; (iv) Spread between estimated cost and original contract amount less than 15%; and (v) Less than 15% of contracts subject to cost and/or time overruns (rounded down). <p>And may include others indicators covering the areas of financial management, environment and social.</p> 				<p>through desk work and interaction with beneficiaries.</p>
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		<p>➤ <u>Area 4</u> - Citizen engagement shall include the following achievements including procedures for data analysis, public dissemination and follow up:</p> <ol style="list-style-type: none"> 1. Complaints handling mechanism in place by Year 2 2. Base line for beneficiary feedback / citizen report card / satisfaction survey is established by Year 2. 3. Procedural guidelines for community engagement are prepared by Year 1. 4. Progress report on the implementation of the community guidelines is submitted by Year 3. 5. Beneficiary feedback / citizen report card / satisfaction survey is conducted and report submitted by Year 4. 6. Over 50% of the received complaints/ grievances are responded to and processed by Year 5. 				
4	Preparation and approval of a new national tariff structure for water and sanitation services by MHUCC to allow for sustainable cost recovery	<p>DLI4 is a measure of Financial sustainability that should be in control of the Government. The target will be considered achieved if a tariff structure for water supply and sanitation services that allows for greater cost recovery is approved.</p>	No	MHUUC	IVA	Verification by IVA of the approval of a tariff structure for water supply and sanitation services that will allow for cost recovery (O&M cost) in 2020.
5	Establishment of PMU and approval of a National Rural Sanitation Strategy by MHUCC	<p>DLI5 reflects a key policy instrument for sustainable rural sanitation services. The target will be considered achieved if the National Rural Sanitation Strategy is approved by MHUCC incorporates clear strategies for infrastructure development, technologies selection, including more cost-effective approaches through the Code of Practice, Pro Poor service delivery, community and private sector participation mechanisms, financing, cost recovery, service delivery model and implementation by the WSCs.</p>	No	MHUUC	IVA	Verification by IVA of the approval by MHUCC of the National Rural Sanitation strategy and that the key Action Plans are designed including clear strategies for infrastructure development, technologies selection, community and private sector participation mechanisms, financing, cost recovery, pro-poor service delivery strategy.

		Additionally by Year 5, key Action Plans should have been designed for implementation of those strategies. A central unit (PMU) should be established to coordinate the National Rural Sanitation Program through a Ministerial decree.				
6	Approval of standard operating procedures for land acquisition under NRSP by MHUUC	This DLI is to streamline the current complex process, which involves many organizations. This will be achieved through developing a Standard Operating Procedures (SOP) for managing land acquisition, issuing a MoU among relevant line ministers to mainstream the land acquisition process, assign the relevant teams and building their capacity. The DLI 6 is triggered if the SOP for Land Acquisition is approved by MHUUC.	No	MHUUC	IVA	Verification by IVA of the issuing of MoU among relevant ministries and approval of SOP by MHUUC in accordance with guidelines in Operational Manual. The IVA will assess that the current regulations and mandates are simplified through annual, not just documenting the current processes.

Bank Disbursement Table

#	DLI	Bank financing allocated to the DLI	Of which Financing available for		Deadline for DLI Achievement ¹	Minimum DLI value to be achieved to trigger disbursements of Bank Financing ²	Maximum DLI value(s) expected to be achieved for Bank disbursements purposes ³	Determination of Financing Amount to be disbursed against achieved and verified DLI value(s) ⁴
			Prior results	Advances				
1	Establishment and functioning of at least 167,000 new household (HH) connections to working sanitation systems in villages and satellites of which at least 10% of the connections are in satellites	US\$220M	0	US\$55M	June 2020	This is a linearly scalable DLI for the new HH connections Y1 (2016): 25,000 Final designs Y2 (2017): 67,000 Final designs 2,000 connections (20% of 10,000)* Y3 (2018): 8,000 Connections (20% of 40,000)* Y4 (2019): 10,000 connections (20% of 50,000)*	This is a linearly scalable DLI for the new HH connections. <ul style="list-style-type: none"> Maximum for new HH connections is: US\$192,050,000 Maximum for Final designs is: US\$ 27,950,000 	Y1 (2016): US\$15M on final designs Y2 (2017): US\$12,950,000 on final designs Y2 (2017): US\$1,150 per new connection verified Y3 (2018): US\$1,150 per new connection verified Y4 (2019): US\$1,150 per new connection verified Y5 (2020): US\$1,150 per new connection verified

						Y5 (2020): 13,400 Connections (20% of 67,000)* *Further, 10% of total connections made must be made in satellites		
2	Annual transfer of Performance Based Capital Grants (PBCGs) by MHUCC to eligible WSCs	US\$40M	0	US\$10M	June 2020	N/A (not scalable)	N/A (not scalable)	US\$8M per year when yearly results are achieved and verified
3	DLI 3: Design and implementation of the Annual Performance Assessment (APA) system for the WSCs, and WSCs achievement of the required APA threshold scores in accordance with the Program Operations Manual	US\$170M	0	US\$42.5M	June 2020	N/A (not scalable)	N/A (not scalable)	Y1 (2016): US\$15M on Performance Improvement Action Plans prepared Y2 (2017): US\$20M on APA Manual prepared and the first APA for each WSC carried out Y3 – Y5 (2018-2020): US\$45M Each WSC achieves the minimum threshold APA scores
4	Preparation and approval of a new national tariff structure for water and sanitation services by MHUUC to allow for sustainable cost recovery	\$50M	10	US\$12.5	June 2017	N/A (not scalable)	N/A (not scalable)	Prior Result of New National Tariff Structure prepared: US\$10M Y2 (2017): \$40M New National Tariff Structure approved by MHUUC and decree issued

5	Establishment of PMU and approval of a National Rural Sanitation Strategy by MHUUC	\$50M	10	US\$12.5	June 2020	N/A (not scalable)	N/A (not scalable)	<p>Prior Result of PMU created for the formulation and coordination of NRSP and the National rural Sanitation Strategy US\$10M</p> <p>Y2 (2017): US\$30M disbursed when National Rural Sanitation Strategy approved by MHUUC.</p> <p>Y3 (2018) to Y5 (2020): US\$10M disbursed with key action plans designed (not time-bound within Y3 and Y5)</p>
6	Approval of standard operating procedures for land acquisition under NRSP by MHUUC	\$18.625M	0	US\$5M	June 2017	N/A (not scalable)	N/A (not scalable)	<p>Y2 (2017): US\$18.625M disbursed when Standard Operating procedures for land acquisition under NRSP prepared and approved</p>

Annex 4: Summary Technical Assessment

I. Program Strategic Relevance

1. *The GoE, having attained close to universal coverage for water supply in rural areas (96 percent), launched the NRSP in 2014 to address the low coverage of sanitation in rural areas (12 percent). Rural sanitation is identified as one of the Presidential priorities.*

2. *In the past five years the water and sanitation sector has received about six percent of the public investment budget.* Although, half of this has been allocated to rural governorates for sanitation, the money went mostly to the larger cities in those governorates, which explains why rural sanitation is still lagging. Expenditures financed by donors have also been significant. The sector was reformed in 2004, and many improvements have taken place. However, infrastructure development is still over-centralized and delinked from operations and long-term sustainability of the WSCs.

3. *While the reforms and investments in the sector have led to huge strides in terms of water supply coverage and urban wastewater collection and treatment, the level of service provided and the sustainability of that service has been at risk due to persistent institutional weaknesses.* There are considerable opportunities to improve service delivery and sustainability at the level of the WSCs.

4. *The strategic approach of the GoE is to promote decentralized decision making at the governorate level by increasing the financial viability, operational, and managerial performance and capacity of WSCs, and improving the overall accountability framework at the local level.* More efficient delivery of infrastructure, with improved service delivery at the local level, should be combined with the creation of an enabling environment at the national level since some of the underlying constraints, for example the low tariff, need to be addressed at the sector level.

5. *Strategic relevance.* The Nile Delta is particularly important for the GoE not only because it is home to 50 percent of the population but because of the extreme population density (> 1,000 inhabitants per square kilometer), a very high water table (up to one meter below ground level), and a very intricately woven and tight web of canals and drains, as is characteristic of any Delta. Wastewater and sludge are dumped into the nearest water body (such as drainage and irrigation canals), and on agricultural fields, as well as in houses, posing significant health burdens, environmental damage (including contamination of groundwater), and economic losses. Addressing the sanitation problems in the Nile Delta will have very lasting impacts on health, environment, income of the population, economic externalities, and public benefits because of the high value of scarce water resources. This provides a strong rationale for government involvement in rural sanitation, especially in the Nile Delta.

II. Program Technical Soundness

6. *The Program assessment has built on lessons learned from recent programs and projects.*

1.1. Assessment of Results Area 1 – Improved Access to Rural Sanitation

7. **Access to sanitation.** The GoE defines access to sanitation only in terms of access to public sewer networks. In this case, sanitation coverage levels are significantly low given that in Egypt only 12 percent of rural households are currently connected to sewerage networks. Many rural villages have attempted to improve the situation themselves by constructing Bayaras (trenches) in the Nile Delta and installing informal sewerage networks. However, the issue is that the Bayaras are no longer functioning due to the high groundwater table, the low permeability of soil in the Delta, and the dramatically increased use of water by piped water supply, combined with rapid population growth.

8. **Infrastructure investments.** At the core of many problems of the water and sanitation sector, especially regarding infrastructure delivery is the centralized model of decision-making for infrastructure investment. This model favors the large national organizations and the separation of infrastructure investment, construction, and rehabilitation from management, operation, and maintenance of the systems. Sector initiatives and investments to date have been mainly directed at sanitation infrastructure - in particular sewerage networks and wastewater treatment plants - as opposed to a combination of infrastructure development and sound management of existing facilities. In addition, this infrastructure has been expensive compared to other countries with similar levels GDP. This is due to: (i) the separation of investment from operations, as mentioned above; (ii) the reliance on consultancy firms and construction agencies to select technologies, and their associated costs; (iii) the preference for building traditional conveyance and treatment systems; and (iv) the need to comply with stringent environmental and health laws/codes, which impose high treatment costs.

9. **National Rural Sanitation Strategy.** The Government of Egypt has developed a rural sanitation strategy based on clustering villages around wastewater treatment plants so that they can be served economically. This strategy is backed up by governorate water and sanitation Master Plans. The Master Plans: (i) accommodate the current and future changes in population; (ii) evaluate the existing status and identify the required modifications (renewals and replacements) of the existing facilities; (iii) make project investments needed to provide universal water and wastewater services throughout Egypt with a horizon of 2037; and (iv) select priority projects. Villages can be reached through centralized systems if they can be conveniently clustered to allow economies of scale, or also through decentralized systems. Within the 375 existing WWTPs, three types of technology are used in 80 percent of them (relatively large WWTPs): Activated Sludge – 37 percent; Oxidation Ditches – 25 percent; and Waste Stabilization Ponds – 16 percent. The following considerations are important in selecting the technology:

- Effluent treatment performance to be achieved to reach the Law 48 standard
- Capital cost, in particular power costs
- Operating cost
- Land requirements and availability
- Proven technology

10. **Decentralized wastewater treatment solutions.** Many villages and satellites are not connectable to large sewer networks in the short- and medium-term for various reasons. Such villages may best be served by decentralized solutions or by suitable improved septage

management. The costs and benefits of these technological options and approaches need to be analyzed in order to guide investment decisions. Feasibility studies will look at different options and their entire life costs. The unit cost of approximately US\$600/per capita including all relevant costs of feasibility, design, environmental safeguards, and construction supervision, although high, is considered to be realistic.

11. **Cost efficiencies** can also be achieved using more appropriate technical norms and standards to facilitate the inclusion of satellites. Detailed Master Plans at the governorate level must be updated by the WSCs, particularly involving prioritization criteria, detailed costing, and technologies. A pipeline of detailed projects should be further prepared based on these Master Plans.

12. **Sustainable management of wastewater treatment plants.** Another crucial area is the conformity of water and wastewater facilities in subsidiary companies to the Egyptian regulations, codes, laws, and management requirements (human resources, occupational health and safety, operation, maintenance, and quality assurance). Of the 375 wastewater treatment plants in Egypt, 102 do not comply with these requirements. Increasing the rate of the functional WWTPs will be essential to ensure and sustain sector goals.

1.2. Assessment of Results Area 2 – Improved operational systems and practices of WSCs

Table 1 below provides a snapshot of the key indicators for the three WSCs for 2013-2014

Table 1: Key WSC & PforR Program Data (2013/14 unless stated otherwise)

Parameter	Beheira	Sharkiya	Dakahliya	Source of data
1 Population (Nr)	5,100,000	6,488,000	5,999,000	KPIs
2 Number of unserved polluting villages (Nr)	14	218	279	Master Plan
3 Above villages to be served by other projects (Nr)	9	83	29	Master Plan
4 Net villages available for PforR (Nr)	5	135	250	Master Plan
5 Population with continuous water supply	99.0%	96.0%	100%	KPIs
6 Estimated population served with water supply	5,049,000	6,228,000	5,999,000	1 x 5
7 Water Connections (Nr)	783,000	893,000	1,093,000	KPIs
8 Sewer Connections (Nr)	n/a	n/a	n/a	KPIs
9 Population connected to sewers, 2009/10	26%	28%	79%	KPIs
10 Water produced (million cu m/year)	451	362	472	KPIs
11 Per capita water production (l/c/d)	245	159	216	10/(356x5)
12 Staff	7333	5693	7800	Site visits

13. **WSCS Performance.** Improving the operational, managerial, and financial performance of the WSCs will be critical for the sustainability of the investments in sanitation infrastructure. The

WSCs are far from financially autonomous. There is uncertainty and lack of clarity in the data, for example between WSC field visit data and KPI data. Salaries (77 percent of costs) take up nearly all the income (and more than the reported KPI billing receipts). Electricity is the next largest cost at 13 percent, meaning that salaries and electricity account for 90 percent of costs. Deficits are financed in part by non- payments of electricity bills. Maintenance is also often deferred due to insufficient funds.

Table 2 summarizes the scores of the three WSCs on selected KPIs.

TABLE 2– KPI SUMMARY

	RED - POOR	AMBER - ADEQUATE	GREEN - GOOD	
KPI	Beheira	Sharkiya	Dakahliya	Performance/Remarks
Non-Revenue Water	29%	16%	17%	Good
Unplanned interruptions to water supply (Nr/year)	10	2374	345	Mixed –
Bursts per 100km of distribution pipes	95	40	0	Good – 0 not credible
WTPs with production meters (%)	84%	59%	48%	Mixed – 84% good
Working customer meters (%)	99.5%	86.9%	89.8%	Good – not credible?
Water supply complaints per 1000 connections	18	11	12	High
Sewer flooding incidents per 100km of sewer	756	649	3461	Very, very High
Percent of wastewater treated	79%	74%	54%	Mixed
Wastewater complaints per 1000 connections	53	30	16	Very high
Staff per 1000 connections	9.4	6.4	7.1	Fairly high
Metering ratio (% of water connections metered)	98%	99%	99%	Very good
Collection Ratio (Bills collected/Invoiced)	68%	86%	89%	Poor
O&M cost recovery (bill income/O&M costs)	35%	48%	55%	Very poor

14. *The performance has been rated on a red-amber-green system in order to facilitate an overview.* The accuracy of the KPI data is uncertain. It is reported that illegal connections were common and that the NRW figures should be treated with caution.¹⁶ The percentage of working meters is obviously a gross overestimate.

15. *The main challenge in terms of sustainability is related to the capacity of WSCs to maintain the systems and ensure sound assets management.* The Program addresses these issues by providing capacity building to WSCs and training to the technical staff engaged in operation and maintenance. The existing subsidiary companies at the governorate level that are charged with management, operation, and maintenance of the systems are generally very weak. Institutionally, these WSCs are beholden to the central level organizations from which they have inherited assets that they must operate and maintain.

16. *The service delivery targets.* The service delivery targets of the NRSP and the PforR will not be met and sustained through infrastructure development alone. Although many of the constraints of poor service delivery are associated with poor design and very poor construction

¹⁶ It was noted that some WSCs might engage in the practice of distributing NRW amongst non-metered customers

quality, there are still institutional constraints both at the WSC and the sector levels. Over-manning (80 percent of costs related to staff) and skills shortages crucially affect performance. There are also governance considerations, such as the composition of the WSC boards, which do not effectively represent consumer interests and potentially slow down the pace of reforms. The WSCs and HCWW are well aware of these and other constraints and have developed a number of programs and initiatives, sometimes with the support of donors, to address them. It is absolutely crucial that these initiatives are further supported and consolidated rather than re-inventing new ones. At the sector level, EWRA does not exert as strong a governance influence on WSCs as it could, and the low tariff undermines all attempts for financial autonomy. The low tariff also makes consumers indifferent, since they are unlikely to complain about a service that is close to free.

17. ***Service delivery challenges.*** While the rationale for developing sanitation infrastructure is strong, there will be challenges in project delivery at the local level. Some of the WSCs have experience in delivering projects under the Improved Water and Wastewater Services Program (IWSP) and ISSIPs, but actual implementation volumes have been low. A key weakness is to ensuring the high quality of designs and construction supervision. The WSCs should take ownership over planning of the work by selecting priority projects and by procuring and administering contracts. In this way, the ISCs will provide the key to successful delivery. It will be important that the procurement of the ISCs focuses on quality issues and not simply on the cost. ISCs ability to work constructively with the WSCs is also important. The ISC will provide full time support and guidance and provide the opportunity for WSC staff to learn on the job. It is important that the ToRs for the ISC give sufficient emphasis to this capacity development role.

18. ***Grievance.*** There is no integrated online database that consolidates grievances across Egypt. The logging of grievances is inconsistent since the calls received through the hotline are not systematically recorded, and complaints received through other channels are rarely documented. Therefore, it is difficult to assess the real volume of complaints. In practice, complaints received through informal channels, particularly those directed to maintenance staff, are more quickly addressed. Approximately 50 percent of the 10 million calls made to the hotline during 2014 received a busy signal. Only 35 percent of the complaints are made through the official channel using the hotline. Sixty-five percent of the complaints are collected through informal channels, 50 percent are directed in person directly to maintenance staff at the Customer Service Centers. The number of sewer complaints about flooding is alarming. There is an existing system for responding to consumer grievances, most of which relate to overflows in the sewer network.

19. ***The key areas for improvement are:*** (a) the need for an integrated management information system/database to include standardized procedures for processing grievances; (b) preference of informal versus formal complaints channels; and (c) constraints in access to phone lines (i.e. busy phone lines).

20. ***Human resource development is needed to underpin and sustain the performance of the WSCs.*** The WSCs are over-manned but also under-skilled. The WSCs inherited an unwieldy and inadequately qualified staff which combined with a long recruiting ban from 2006, means that many of the companies lack a solid middle management cadre. This has compromised their ability to undertake their functions. There is an opportunity, even allowing for the salary levels, to recruit, train, and retain young, talented Egyptian technicians and professionals. It is evident that the WSCs

are already doing this. Although the PforR will not make a direct contribution to human resources development, an indirect contribution will be made through the ISCs who will train many staff of the WSCs and expose them to effective capital planning.

21. *The PforR will make available through the HCWW significant financial resources for operational and financial performance as a percentage of the loan (5 to 10 percent).* Through the WSP capacity-building grant, the PforR will help the three WSCs prepare a strategic plan, assets management instruments, and APIAPs using peer-to-peer assistance with well-performing utilities in other countries in MENA or other regions (Water Operators Partnership Model). A number of donors are involved in various programs aimed at improving operational and financial performance. The PforR will rely on and consolidate these ongoing initiatives by the WSCs, supported by the HCWW and donor programs.

1.3. Assessment of Results Area 3 – Strengthened National Sector Framework

22. *Financially, the WSCs are heavily subsidized by the central Government and have no independent authority to raise the nationally set tariffs.* There have been several attempts to introduce higher tariffs. Some progress has been made in raising the tariffs of industrial and large-scale users and in affecting small gradual increases in the water and sanitation tariffs. However, the tariff is still insufficient to provide an operational surplus, leading to the deferred maintenance and operational shortcuts. Many external donors, most notably USAID through their Water Policy and Regulatory Reform program, have drawn attention to the need for EWRA to be truly independent if the sector is to benefit from systematic improvement in the governance arrangements. EWRA have prepared a detailed tariff study and proposal for consideration by the Cabinet. There has been some progress on amendment of the codes of practice, for example to allow the use of shallow sewers, but a comprehensive review is not yet complete.

23. *Specific aspects of a new rural sanitation strategy are being developed by an EU-financed consultancy managed by the HCWW.* This analysis will feed into the broader national strategy that will be developed by the MHUUC's new central unit, the PMU.

III. Institutional Implementation Arrangements

1.4. Description

24. *The MHUUC has set up a Program Management Unit by Decree No. 154 of 2015 and further expanded its mandate by Decree No. 325 of 2015.* The main responsibilities of the PMU are:

1. To coordinate implementation of the National Rural Sanitation Program.
2. To develop a revised National Rural Sanitation Strategy to establish the vision for the sector and the key policies needed to achieve universal access through improved service delivery mechanisms.
3. To prepare a full-scale strategic action plan for the Unit, provided that such plan is integrated with the Ministry's plan.
4. To supervise all procurement activities related to implementation of the Program.
5. To monitor implementation of projects in the participating Governorates.

6. To review and approve the investment plans for participating WSCs.
7. To ensure that the Program's implementation activities are performed in accordance with the Program's conditions agreed upon with the financiers.
8. To submit periodic Program performance reports to the Minister of Housing, Utilities, and Urban Communities.
9. To assess implementation deviations, if any, and propose remedial actions.
10. To engage with the foreign entities that finance the NRSP.

25. ***While the PMU will be the coordinating agency for the PforR, day-to-day implementation will be delegated to the WSCs who will be responsible for Results Area 1.*** The WSCs and HCWW will both act as executing agencies for Results Area 2. The MHUUC and others will act as executing agencies for results area 3. The practical arrangements for funding and contracting are as follows:

- As the overall coordinating agency, the MHUUC will receive program funds released by the MoF in accordance with the agreed-upon schedule, based on the attainment of the PforR DLIs. The MHUUC through the PMU will authorize the release of funds to the WSCs as the main executing agency for results area 1 in conformity with Egyptian financial management systems and based on the assessment of their performances. Funds will also be released to other executing agencies associated with results areas 2 and 3.
- As the main executing agency for results area 1, the WSCs will enter into contracts for goods and services with contractors and consultants. Payments will be endorsed by the ISCs until such time that this additional measure is not found necessary.

1.5. Assessment

26. ***The MHUUC will be undertaking a new but also temporary function involving preparing, coordinating, and providing oversight of the NRSP.*** The PMU, which will be part of the MHUUC, will be established for this purpose and staffed accordingly. Being located in the MHUUC, the PMU will also be in a good position to spearhead the proposed enhancements. The PMU is however vulnerable to changes in the top management of the ministry. It is important that the PMU does not take over the roles of the HCWW or the WSCs.

27. ***The capacity of the WSCs as executing agencies is the single most influential factor for ensuring the success of the Program.*** The reform process put in place since 2004 has led to significant improvements in sector performance. Based on the IWSP and ISSIP experience, when a substantial level of support from ISCs is available and the responsibility for implementation is transferred to WSCs, it can be expected that with an appropriate packaging of contracts, the level of investment envisaged by the PforR in Results Area 1 is attainable. The KPI performance of the WSCs is generally good, and although there are concerns about the reliability of the KPI data, it is clear that the WSCs have made significant strides in operational performance. The WSCs are well placed to deliver progress in Results Area 2 (operational and financial improvements) if there is clear leadership from HCWW, as the sole shareholder, to move to a more commercial operation with full O&M cost recovery.

28. ***The program is of high priority to the Government.*** The Government has focused on increasing the access to water in the last two decades. Access has now reached close to 100 percent.

The current focus is on improving wastewater management, especially in the Delta, given the high water tables, wastewater is a health hazard and can cause buildings to collapse and lead to very high household expenditures on septic tank emptying services. Pollution of the agricultural drains is also reducing Egypt's available freshwater resources and limiting the possibility for agricultural expansion in the Sinai desert. The Government is currently subsidizing operations in the sector with LE 750 million per year (2014) and its high priority is to reduce this amount by improving cost control and eventually increasing the tariff.

IV. Expenditure Framework

29. ***Responding to the need to expand rural sanitation coverage, the GoE has been channeling considerable investments to rural sewerage systems.*** In the last five years, the water and waste sector has received about six percent of the public investment budget. Of this amount, just over half of the LE 34 billion has been allocated to rural governorates for sanitation, but has primarily been spent in the larger cities, which helps explain why rural sanitation is still lagging. Expenditures financed by donors have also been significant. Over the period 2002-2008, donors provided US\$585 million.

30. ***Unit costs are relatively high and above the levels envisioned in the overall budget of US\$14 billion for the NRSP.*** Cost efficiencies, both for investment and lifecycle costs, will need to be found. A thorough feasibility study will help identify minimum cost alternatives based on the current master planning and decision support systems.

31. ***Tariffs are low and O&M subsidies, although considerable, are still below 15 percent of the recurrent budgets of most WSCs.*** Deficits are controlled by deferring maintenance and postponing payment for electricity. Subsidies to the WSCs are administered by the HCWW, providing leverage to negotiate annual financial and operating improvements with WSCs.

32. ***The PforR will increase the O&M burden on the WSCs. Tariff increases and improvements in operational and financial management will therefore be needed.*** It is assessed that the consolidation of current programs for improving operational and financial performance, combined with realistic tariff increases of 1 to 2 piasters per cubic meter per year, will allow a gradual cost recovery to be achieved.

33. ***O&M expenditures in the hands of the participating WSCs are expected to be significant (Tables 3, 4 and 5 for Sharkiya, Beheira, and Dakahliya), and mainly funded by tariff revenues (LE 2,066 million in Sharkiya and LE 3,022 million in Dakahliya).*** O&M subsidies currently fund less than 10 percent of the operational expenditures, and are expected to decline gradually, as was the case with the implementation of the 2010 Water and Sanitation Sector policy. The policy recognizes the need to achieve financial independence through improving investment and operational efficiency and increasing tariffs and reducing subsidies. The PforR will ensure that actions are successfully completed, as part of the DLIs and PAP. This will lead to improvements in investment and operational performance, by supporting EWRA in the development of protocols for the use of business plans, and by working hand-in-hand with HCWW in its capacity as an owner.

Table 3. Sharkiya WSC Indicative O&M expenses and sources of funding (LE million)

	Baseline	2015/16	2016/17	2017/18	2018/19	2019/20	2015-2020
Water Services	248	253	259	264	270	276	1,571
Sewerage	150	161	171	179	186	191	1,037
Total Expenditures	398	414	429	443	456	467	2,608
<i>of which Dep allowance</i>		62	64	67	68	70	391
Sources of funding							
Tariff revenues	238	271	315	362	413	467	2,066
O&M subsidies (HCWW)	32	40	30	20	15	0	137
Funding gap	N/A	104	85	61	28	0	277

Source: Baseline Sharkiya Financial Statements; projections based on discussions with WSCs and EWRA.

Table 4: Dakahliya WSC Indicative O&M expenses and sources of funding (LE million)

	Baseline	2015/16	2016/17	2017/18	2018/19	2019/20	2015-2020
Water Services	391	395	400	404	409	414	2,413
Sewerage	223	225	227	229	231	232	1,367
Total Expenditures	614	620	627	633	640	646	3,780
Of which Dep Allowance		93	94	95	96	97	567
Sources of funding							
Tariff revenues	367	420	474	529	587	646	3,023
O&M subsidies (HCWW)	37	45	35	25	15	0	157
Funding gap	N/A	156	118	79	38	0	391

Source: Baseline Dahkahliya Financial Statements; projections based on discussions with WSCs and EWRA.

Table 5: Beheira WSC Indicative O&M expenses and sources of funding (LE million)

	Baseline	2015/16	2016/17	2017/18	2018/19	2019/20	2015-2020
Water Services	269	278	286	296	305	314	1,748
Sewerage	115	117	120	122	125	127	727
Total Expenditures	384	395	406	418	430	442	2,475
Of which Dep Allowance		59	61	63	64	66	371
Sources of funding							
Tariff revenues	262	292	327	364	403	443	2,092
O&M subsidies (HCWW)	7	7	0	0	0	0	14
Funding gap	N/A	96	79	54	27	-1	255

34. *Based on the experience acquired by HCWW in using the subsidy as a powerful leverage incentive instrument, the PforR will ensure the closing of the funding gap of participating utilities with the aim of achieving WSCs' financial independence as stated in the 2010 Water and Sanitation policy.* For this purpose, HCWW will be allocated increased recurrent funding (on top of the LE750 million it receives from MoF) to use in the three participating WSCs to orchestrate improvements in operating and financial performance. In this context, it is noteworthy that (as can be seen in Tables 3, 4 and 5), the Sharkiya, Dakahliya, and Baheira WSCs are expected to increase their revenues up to the point where they fully cover O&M and depreciation by the year 2019/20. This will be possible only as a result of operating improvements and tariff increases, and careful administration of the incentive-based transfers by the HCWW.

35. *Once operating and financial improvements are achieved gradually and tariff increases are granted, beginning in FY 2017/18, the Sharkiya and Dakahliya WSCs will begin having net*

positive depreciation allowances (depreciation allowance minus funding gap). By the year 2020, Sharkiya will have LE 70 million (about US\$10 million) of depreciation allowance, and Dakahliya will have LE 97 million (US\$13 million), for both of them to finance investments out of tariff revenues. The assumptions include an average tariff increase for Dakahliya from LE0.57 to LE0.85, over five years (about 1 piaster every two months). Current tariff policy suggests increases of 2 piaster every two months.

V. Results Framework and Monitoring & Evaluation

36. *The Program M&E system will be based on the Results Framework with monitoring at all framework levels, including activities, outputs, and intermediate objectives.* The M&E will be carried out at four levels of detail and frequency:

- 1) Normal day-to-day program management monitoring carried out by the ISC consultants on the infrastructure implementation and the normal day-to-day monitoring systems used by the WSCs for their operations;
- 2) Preparation of monthly/quarterly Program reports by the ISCs on behalf of the WSC that detail the activities and results during the month/quarter, and that include updated cumulative measures and “S” curves, as well as highlighting issues and decisions needed from the PMU;
- 3) Submission of reports to the PMU for review and response, and for combining into an overall Program monthly/quarterly report that will be submitted to the MHUUC and the Bank; and
- 4) Preparation of an annual validation assessment by the IVA to audit the results framework and the annual DLI achievements.

37. *Finally, a mid-term review by the Bank will be undertaken after two years where the M&E could be revised if needed.*

38. *An important lesson from both ISSIP and other programs is that it is important to closely monitor performance and to take corrective actions as soon as possible.* A considerable amount of M&E capacity will be provided under the Program, including: the setting up of a new PMU with M&E as a prime function; procurement of ISCs under the loan to support both the PMU and the WSCs, including carrying out most of the M&E activities; and provision of an IVA.

39. *The PMU and HCWW will support the WSCs in measuring progress appropriately by using the M&E system described above, and will collate the results to assess progress in achieving the DLIs.* The results across the Program region will be aggregated as the basis for meeting the DLIs. Once satisfied with the accuracy of the reporting, the PMU will present evidence of the DLI achievement to the Independent Verification Agency, which is tasked with verifying the results. In order to validate the disbursement request submitted by the PMU, the Independent Verification Agency will verify all DLI target indicators through both a desk review and physical inspection.

40. *The Independent Verification Agency will validate the baseline information submitted by the WSCs and evaluate attainment during the program. Obtaining a robust baseline will be*

necessary, especially for the DLIs related to improved performance of the WSCs. Several of the DLIs do not require a baseline figure. For the other DLIs the WSCs already have provisional baseline data in their KPIs (e.g. Operating Ratio). Results will be verified through physical inspection that tests the accuracy and quality of results claimed. In accordance with good audit practice, physical verification will take place against a sampling framework and frequency. Physical inspection will be focused on ensuring working connections at the household level, on determining wastewater effluent quality, on O&M cost recovery, and on the use of the connections, including the gender aspects of that use. Based on these two steps, the Independent Verification Agency will prepare a Results Verification Report, which will be shared with the PMU and the Bank. A key purpose of the Results Verification Report will be to determine the amount of the eligible disbursement to be made, based on results achieved.

41. **Advances.** Up to 25 percent of total Program financing (“advance”) will be made by the Bank to the MoF. After consulting stakeholders, MHUUC and MoF will jointly determine how much of an advance will be requested, but for planning purposes it is assumed that the maximum 25 percent will be requested. When the DLI(s) against which an advance has been disbursed are achieved, the amount of the advance will be deducted (recovered) from the total amount due to be disbursed under such DLI(s). The advance amount recovered by the Bank is then available for additional advances (“revolving advance”). The Bank requires that if the DLIs have not been met (or have been only partially met) by the Closing Date, the Borrower must refund any advances (or portion of advances) promptly upon notice thereof by the Bank. If the Bank establishes after the Closing Date that the Withdrawn Financing Balance exceeds the total amount paid for Program Expenditures, exclusive of any such amounts financed by any other financier or by the Bank under any other loan, credit or grant, the Borrower shall, promptly, upon notice from the Bank, refund to the Bank such excess amount of the Withdrawn Financing Balance. The Bank shall then cancel the refunded amount of the Withdrawn Financing Balance.

VI. Economic Evaluation

42. **Economic Justification.** An incremental cost benefit analysis demonstrates that the Program’s economic impact is positive. The analysis employed incremental cost benefit analysis based on the consumer surplus measurement method. The net benefits were derived by comparing the benefit streams with the project to the corresponding benefit streams without the project. The benefits were estimated based on the incremental sanitation service provided to the hitherto unserved population (about 830,000) valued through the prevailing official wastewater surcharge and consumer surplus. The consumer surplus resulted from the amount that the unserved people are currently willing to pay for a sanitation service (which is considered to be at present very high) and the amount they are expected to pay once they get access to the project-delivered sanitation services (which is considered to be extremely low). The project does not only improve the sanitation service but also reduces its cost to customers. Cost reductions typically occur in sanitation services such as the result of emptying septic tanks. Those with access to informal on-site sanitation facilities currently consume a lower quantity of water on a per capita basis, but they pay significantly higher costs for sanitation service in comparison to both those using informal sewer networks and those having access to public sewerage systems. In general, the unserved villagers pay 20 times more for sanitation services as compared to those with access to improved

sanitation facilities. Those with access to informal networks pay relatively lower per capita and consume more water, as compared to those using on-site sanitation systems or traditional Bayaras.

43. ***The project benefits and costs are evaluated from the society's perspective and to the extent that practicable externalities are considered.*** The investment costs depend on the technological options and approaches adopted to provide sanitation services to the target beneficiaries. Thus, the available unit cost estimates are quite variable and uncertain. The costs generally range between US\$386 to US\$765 per capita, with an average of about US\$563 per capita. The O&M costs were assumed to be three percent of the estimated capital costs. The planned sanitation intervention in the Delta region has direct and indirect benefits. The range of possible benefits that are attributable to the project are wide, but the quantification of many benefits is difficult, if not impossible. Therefore, the present analysis focused on a valuation of private health and other benefits, public health benefits, and resource recovery and re-use benefits. The results of the economic analysis are summarized in Table 6. The analysis was carried out by considering three scenarios to enhance the robustness of the analysis and the emerging conclusions. The first Scenario (Column 1) considers only private benefits inclusive of the consumer surplus. The second Scenario (Column 2) considers private plus public benefits. The last scenario (Column 3) presents the total private plus quantifiable positive externalities, including resource recovery and re-use benefits.

44. ***While the economic viability of the project (analyzing it from the society's point of view) is quite robust, its economic viability alone may not ensure the sustainability of the service.*** The calculated surpluses and the estimated external benefits accrue mainly to other entities, and not to the party responsible for operating and maintaining the sanitation system. For example, the average total incremental cost (a proxy for long-term average marginal economic cost) is 29 times higher than the prevailing sewerage tariff, and the average O&M cost is about six times higher. Ensuring the sustainability of the service may therefore require either a substantial tariff hike or continued government and donor financial commitments, or both. The latter may pose a significant fiscal burden on the Government. Current estimates of average willingness to pay a higher tariff apparently show that this is significantly higher than the prevailing tariff, suggesting the social feasibility of upward tariff revisions. Of course, a substantial reduction of operating costs through improved efficiency gains can also contribute to sustainability of the service, and is a major thrust of the Program.

45. ***The Program intervention is generally pro-poor in approach.*** Since actual household connections will be provided free of charge (again, justified by the positive economic externalities) poor households will not be excluded, given that it has been repeatedly demonstrated throughout the world that subsidies for access are more pro-poor than consumption-based subsidies.

VII. Evaluation of the Technical Risks

46. ***The overall risk is rated "Substantial" given that the rating is expected to reflect risks prior to the mitigating activities contemplated under the Program.*** The IWSP and ISSIP programs both suffered from significant initial problems but have now been restructured based on lessons learned from the earlier phases: the procurement for ISSIP 2, for example, has demonstrated a significant improvement over previous procurement timelines. These lessons have

been incorporated in the design of this Program. A summary of selected risks is presented in Table 6.

Table 6: Evaluation of Technical Risks

Topic	Risk/Assumption	Mitigation Measures	Risk Level
RESULTS AREA 1	Unqualified contractors are selected on lowest cost basis lead to long delays and poor quality work	Infrastructure contracts will need to be arranged in contract packages of over LE 50 million to ensure that only Grade A contractors are eligible to bid (smaller contractors can be involved through sub-contracting).	Substantial
	Inability of the WSCs to develop enough capacity in the relatively short start up time scale to procure and manage many medium to large projects, and more importantly to develop the ability to manage a program of infrastructure projects as a program rather than as a multitude of individual projects.	Include a specific activity in both the TA and the ISC terms of reference to help the WSCs to develop a strong understanding and ability in project and program management.	High
RESULTS AREA 2	Low performing WSC	Increase value of the performance related DLI, direct TA towards this area and ensure good coordination and consistency with the actions of other donor support.	High
	Incentives under the Program will be effective and that staff involved at all levels of implementation will be incentivized to deliver results. This may not be the case due to a lack of performance-based culture within these government organizations. Although there are performance-based reward systems in place, these will not necessarily provide sufficient incentive.	Prepare NRSP-PforR briefing materials for the WSC boards and senior management.	Low

Topic	Risk/Assumption	Mitigation Measures	Risk Level
RESULTS AREA 3	Lack of financial sustainability of the WSCs may put at risk the sustainable O&M of the new infrastructure.	New tariff structure that would cover O&M costs.	High
INSTITUTIONAL ARRANGEMENTS	The capacity of the new PMU to supervise and coordinate such a large program and the danger of lack of clarity between the role of the PMU and the role of the HCWW and the WSCs.	Develop ToR for the PMU, PIU and clear program-related roles for WSC and HCWW.	High

VIII. Program Technical Action Plan

47. A summary of the proposed actions based on the Technical Assessment is given below in Table 7.

Table 7: Program Technical and Institutional Action Plan

#	Actions
1	The PMCF will need to be procured by the PMU using World Bank procurement procedures to avoid selection of unqualified firms due to the difficulty in avoiding appointment of the lowest bidder. For this purpose, it has been agreed that the PMCF will be financed by the ISSIP 2 project. The ISC(s) that will be contracted to support the individual WSCs will be supervised by the PMCF.
2	Coordination arrangements will need to be made with IWSP and ISSIP in the three governorates where these projects also currently operate.
3	Obtain credible commitment from GoE to approve new tariff structure that covers O&M costs.
4	Develop ToR for PMU, PIU and Program Implementation Manual with clear roles for WSCs and HCWW.
5	Prepare NRSP-PforR briefing materials for the WSC boards and senior management and undertake the briefings.
6	Put in place a prior detailed baseline related to DLI actions on WSC performance improvement.

Annex 5: Summary Fiduciary Systems Assessment

1. *The measures that were identified by the FSA to strengthen the fiduciary systems and address the gaps through DLIs and in the Program Action Plan, will provide reasonable assurance that the funds will be used as intended in accordance with the Bank's PforR policy.* Based on the expenditure program, no contracts in excess of the PforR policy exclusion limits have been identified. In addition, given the findings of the FSA and considering the identified weaknesses and constraints, the overall fiduciary risk for the Program has been determined as "High."

Purpose of the Fiduciary Systems Assessment (FSA)

2. *The program fiduciary systems assessment considers whether program systems provide reasonable assurance that the financing proceeds will be used for intended purposes, with due attention paid to the principles of economy, efficiency, effectiveness, transparency, and accountability.* The Program procurement systems are assessed to determine the degree to which the planning, bidding, evaluation, contract award and contract administration arrangements and practices provide a reasonable assurance that the Program will achieve intended results through its procurement processes and procedures. Meanwhile, the financial management systems are assessed to determine the degree to which the relevant planning, budgeting, accounting, internal controls, funds flow, financial reporting, and auditing arrangements provide a reasonable assurance that Program funds are being used appropriately and the assets safeguarded. The fiduciary assessment examines how program systems handle risks of fraud and corruption, and how such risks are managed and/or mitigated (by providing a complaint mechanism, etc.).

3. *The key principles that guided the preparation of the FSA were to:*

- (1) Ensure that the systems to be used are transparent, provide for clear accountability, are performing, and help achieve the Program's results; and
- (2) Ensure that the funds are used appropriately under the Program and the identified risks are adequately addressed.

4. *The FSA also considered the effectiveness, efficiency, economy, transparency, and accountability of control arrangements, budgeting, accounting, financial reporting, fund flow, and auditing arrangements, and planning, bidding, evaluation, contract award, and contract administration arrangements, among others.*

Procurement and Financial Management

5. *The FSA built on the Bank's knowledge of the Water and Sanitation Sector in Egypt.* The preliminary assessment of this Program and the sanitation sector in general indicates that potential challenges can be mitigated if proper governance arrangements are in place and enforced. The sector's structure and the legal mandates of the different entities pose some overlapping and sometimes conflicting responsibilities that influence accountability and may dilute it. For example, infrastructure investment is the responsibility of entities that are different from those in charge of operation and maintenance. While this may be due to legal and institutional requirements, the sector cannot properly function unless strengthened governance arrangements are in place, with

roles clearly demarcated, and with each party accountable for its own deliverables and performance.

6. ***Previous experience with the sector through ISSIP projects identified that the extremely lengthy and inefficient path for the flow of funds constituted a serious implementation constraint.*** The flow of funds (World Bank, NOPWASD, HCWW/PMU, WSCs/RSU, contractors) and the corresponding flow of documentation from WSCs back through the same channels resulted in a high and unjustifiable transaction cost. While there were implementation delays at several operational levels, delays in payments processing was also noted. For example, substantial delays in processing contractors' invoices (in some cases, contracts allowed 28 days for invoice payment but in practice took 54 days) were caused by opaque controls and lack of a streamlined process (inefficient reviews, correspondence and approval steps). The new Program is designed to enable a more efficient flow of funds and information across the implementation units/departments by reducing the flow of transactions documentation across different entities, while requiring periodic reporting and monitoring of progress indicators, as well as independent verification.

7. ***The Program's operational procedures will require introducing mandatory lead times for the different processes and critical milestones such as the preparation of designs and specifications, bidding documents, bid appraisals, contract awards, and the processing of contractors' invoices.*** Quality assurance arrangements should ensure that such measures are duly enforced. Internal audit functions should periodically test the system's functionality and report weaknesses and/or irregularities to an independent audit committee as a prelude to remedial actions being taken.

8. ***The WSCs are not subject to the provisions of Egypt's Public Procurement Law 89/98.*** While the Procurement Law (89/98) in Egypt establishes that "*the State's Administrative Body Units, inclusive of ministries, departments, bodies having special balances, as well as Local Administration Units, Public Authorities, whether being servicing or economic, shall be subject to its provisions*", the WSCs have their own internal Procurement Procedures Manual (PPM). A review of the PPMs of the three participating WSCs revealed that they replicate Law 89/98 almost in its entirety (probably reflecting the fact that the State is the sole shareholder). The main departures from Procurement Law 89/98 found in the Procurement Procedures Manual are as follows:

- a) Allowance for a one-envelope system.
- b) Thresholds for WSC officials (Chairman, Head of Sector, etc.) approvals are different in each WSC. However, in all cases the thresholds are significantly higher in the WSCs Procurement Procedures Manuals than in Public Procurement Law 89.

9. ***It is clear from an examination of the WSCs procurement rules and procedures that the main issues facing the WSCs include:*** i) the need for improvement of procurement practices; ii) inconsistent interpretation and application of rules and procedures; iii) the non-existence of an independent protest mechanism other than an appeal to the Competent Authority. The above factors, together with the fact that the qualification, evaluation, and award criteria are not sufficiently clear in the standard bidding documents used by the WSCs, pose a significant risk.

10. *Although the WSCs have Standard Bidding Documents (SBDs), it is considered that qualification, evaluation, and award criteria are not sufficiently clear.* It is also considered that contract conditions can be improved to achieve a more equitable balance between employer and contractor. A major shortcoming in the WSCs' procurement procedures is that WSCs do not perform a Post-Qualification process on the nominated contractor. This leads to contracts being awarded to non-performing contractors.

11. *None of the WSCs has clear instructions for handling complaints, and there are no clear contractual dispute resolution procedures.* WSCs have established that complaints are to be addressed to the Chairman who then forwards them to the respective departments for preparation of an official response. The system cannot be considered to be independent or transparent. As a result, it has been agreed that **a complaints handling mechanism will be developed and implemented in the MHUUC.** The latter is considered to be the most appropriate body to take on this additional task, which will be to i) establish a complaints handling mechanism that ensures expert and independent decisions by a Review Panel regarding complaints for alleged breaches of the procurement procedures; ii) establish a Registry to receive and manage complaints; iii) establish a Review Panel Administration to manage the Review Panel and procedures for individual complaints; and iv) establish the procedures for the conduct of the complaints review. MHUUC would be required to appoint a List of Panelists consisting of appropriately qualified and impartial experts who will be selected by rotation and will constitute the Review Panel. Once appointed to the List, Panelists will be independent, impartial and bound by the highest ethical standards. The opinion of the Review Panel will be binding on the WSC concerned.

12. *At present, it is considered that the WSCs have limited capacity for providing adequate contract administration and management.* The WSCs have only been involved with network construction. Preparation of the designs/specifications, procurement and construction of trunk lines and wastewater treatment plants has been the responsibility of NOPWASD. In the case of network construction, the designs, specifications, and construction supervision have traditionally been sub-contracted in view of the absence of WSC in-house capacity in this area.

13. *There are several entities responsible for addressing fraud and corruption issues in Egypt.* While some of these entities are required to publish annual reports in accordance with Egypt's 2014 Constitution, these reports are not yet publicly available, as the entities' relevant laws have not been amended to reflect the new constitutional requirements. The following agencies are the anti-corruption actors: i) The Central Auditing Organization (CAO); ii) The Office of the General Prosecutor; iii) The Administrative Control Authority (ACA); iv) The Administrative Prosecution Authority (APA); v) The Illegal Profiting Apparatus (IPA); vi) The Money Laundering Combating Unit (MLCU); and viii) The Complaints Handling Unit in the MoF. In the light of the above, the development and implementation of a complaints handling mechanism in the HCWW is recommended.

14. *The FSA identified the following risks and constraints:*

1. Inconsistent application of rules and procedures.
2. Lack of performance information, linked to an inability to collect and interpret data.
3. Lack of accountability mechanisms such as a functioning complaint and grievance mechanism.

4. Issues associated with the quality of designs and specifications, and the accuracy of cost estimates.
5. Issues associated with contract management, such as non-performing contractors and weak contract supervision.
6. Flow of funds arrangements involve multiple players with potentially conflicting interests/priorities.
7. The traditional practices in the sector meant that the water and sanitation companies (WSCs) were not entrusted with undertaking major capital investments, while the new Program envisages WSCs mainly implementing capital investments.
8. The significant delays in processing payments experienced under other Bank-financed projects raise concerns about inefficiency and potential irregularities.

Program Action Plan (PAP)

15. As a result of the identified weaknesses and constraints, the KPIs associated with the actions required to mitigate the above risks are as follows:

- Develop and implement a procurement procedures manual and standard bidding documents to be adopted by the sector and provide training to WSC procurement staff on the manual.
- Ensure that contracts are awarded only to bidders who have at least the minimum financial and technical qualifications. Ensure that only technically qualified firms are selected to undertake construction supervision.
- Enforce Cabinet Decrees that mandate the advertising of all bidding opportunities, bidding documents, bid evaluation results, original and final contract amounts in the GoE e-portal www.etenders.gov.eg
- Agree on procurement performance indicators.
- Improve procurement practices, i.e. not to allow bidders to offer discounts after the bid due date, no price negotiations unless allowed for and regulated in the bidding documents (BDs), insist on bidders qualifications (financial and technical) to be verified prior to contract award, reduce rebidding, etc.
- Establish and implement a complaints mechanism with clear and simple procedures, with accessible venues where complaints can be registered while confidentiality is ensured, and disseminate and promote the use of the mechanism among the private sector and civil society at large.
- Establish a Quality Assurance Program to verify/ensure a satisfactory level of quality and completeness of designs, specifications, and cost estimates.
- Maximum lead-time is set up for transactions, approvals, and payments processing.
- Firmed-up flow of funds arrangements are adhered to by the different key players.
- A modern internal audit function should be established in the WSCs, reporting to the Board through the Audit Committee, in order to contribute to a systematic and disciplined approach to evaluating and improving the effectiveness of governance, risk management, and control processes.
- Annual financial reports should be publicly available on the website.
- The Program's financial reports to be subject to auditing by the Central Auditing Organization.

Institutional Framework and Fiduciary Arrangements under the NRSP

16. ***A Program Management Unit (PMU) has been established within the MHUUC.*** This PMU, reporting directly to the Minister, will be the main counterpart for the World Bank team with respect to the Sustainable Rural Sanitation Services Program (SRSSP). The PMU has been established by Ministerial Decree No. 154. It is expected that in addition to its coordinating and monitoring function, the PMU will also have a quality assurance role. The MHUUC provides the overall water and wastewater sector leadership. The MHUUC sets sector policy and coordinates its overall investment program. The Ministry oversees a number of specialized agencies and public service companies including EWRA, HCWW, NOPWASD, and the Cairo and Alexandria Potable Water Organization (CAPWO).

17. ***The WSCs will be supported by an ISC.*** Neither the PMU nor the WSCs are in a position to review the designs from a technical viewpoint. The appointment of a qualified ISC to take full professional responsibility for the designs is the main measure for ensuring satisfactory designs. The ISC will provide support and advice in all the technical aspects related to program implementation including, but not limited to: i) pre-feasibility and feasibility studies; ii) preparation of detailed designs, specifications and cost estimates; iii) support to the WSCs through the entire procurement cycle; iv) contract management; v) construction supervision; vi) commissioning; and vii) handover of the sanitation systems.

18. ***All procurement activities will be decentralized and carried out by the three selected WSCs 'organizational structure through their existing procurement departments although NOPWASD has been historically responsible for investment planning, design and supervision of construction of water and sanitation infrastructure projects.*** NOPWASD is a technical implementing agency under the jurisdiction of the MHUUC. Works are funded through the State budget. After completion and at the end of the contractual maintenance period, the facilities are handed over to the HCWW and WSCs for future operation, maintenance, and management. WSCs carry out maintenance work, repairs, and minor extensions using their own financial resources. In recent years, the HCWW and the WSCs have gained experience under donor financed projects (ISSIPs and IWSP) and, with the support of consultants, have been undertaking elements of design and contract management of the systems that WSCs will later operate. Actual implementation volumes have however been low. WSCs will need to be strengthened and procurement staff needs training in complex procurement (trunk lines and wastewater treatment plants) because they lack experience in this type of complex/high value procurement. It is expected that the identified weaknesses and constraints will be initially overcome with the support and assistance that the ISC will provide to the WSCs.

19. ***The PforR funds will be released to the General Treasury (specifically to the MHUUC account at the Central Bank) against "Disbursement Linked Indicators" (DLIs) that were agreed with the Government of Egypt, and duly verified by an IVA.*** In parallel, MHUUC will finance the WSCs according to agreed financing triggers and MRs. Annual capital grants will be paid to WSCs in line with their approved capital investment plans. This will enable WSCs to initiate contracting using the capital grants they receive from MHUUC. WSCs' eligibility for the following year's capital grant will depend on an annual performance assessment conducted for each of the three WSCs. A basic entitlement will be provided for meeting some predetermined

threshold. Additional entitlements will be provided for exceeding the threshold, thus rewarding better performance. More specifically, MHUUC will use the program funds as follows:

First: Annual capital grants will be disbursed by MHUUC to WSCs based on the latter fulfilling the eligibility requirements. The WSCs will use the capital grants to finance their approved capital investment plans. This will enable WSCs to initiate contracting using the capital grants received from MHUUC. Starting from the second year of the Program, WSCs' eligibility for the following year's capital grant will depend on the annual performance assessment conducted for each of the three WSCs. A basic grant will be provided dependent upon the WSC meeting the MRs. Starting from the third year, the annual grants will be provided to WSCs based on performance assessment beyond the MRs, thus rewarding better performance. To ensure clarity of roles and accountability, the Program Operations Manual will specify the responsibilities of each party, the basis for periodic fiscal grants, and the performance assessment protocols.

Second: MHUUC will also release funds to HCWW and WSCs against implementation of capacity building activities evidenced by performance improvement plans.

Third: MHUUC will use part of the Program funds to implement the activities under Results Area 3 (Strengthened National Sector Framework). This involves the national rural sanitation strategy, its implementation, the development of standard operating procedures for areas such as land acquisition, and the review of the national tariff structure for sustainable cost recovery.

20. ***As with other line ministries, MHUUC's budget execution is subject to an ex-ante control system run by the MoF financial controllers and which includes transaction-based compliance controls over payments, recording of transactions, and the production of accounts at unit level.*** This is in addition to the Ministry's own due diligence. MHUUC accounting units are subject to ex-post review of compliance by the Directorate for Financial Inspection in the Accounts and Financial Directorates Department of the Ministry of Finance.

21. ***The Program financial statements will be prepared by the PMU established at MHUUC.*** Since the Program funds in the State budget are transmitted through the MHUUC account at the Central Bank, MHUUC PMU is in a better position to capture and report on the overall Program disbursements. This includes the capital grants to WSCs, transfers to the HCWW and WSCs for preparing and implementing performance improvement plans, and expenditures incurred by MHUUC itself in the course of strengthening the national rural sanitation sector framework. The financial statements will be subject to annual audits by an independent external auditor. In addition, the IVA will review the achievement of the Disbursement-Linked Indicators in accordance with verification protocols.

Program Fiduciary Performance and Fiduciary Risks

a. Assessment of the Program fiduciary performance

- i) **Key elements of the Program’s procurement arrangements in terms of timeliness, cost-effectiveness, competitiveness and compliance with applicable rules, including the handling of complaints**

22. *The extent and profile of the procurable expenditures will be determined by the outcome of the prefeasibility and feasibility studies.* The pre-feasibility studies identify different options for providing sanitation services, and use Global Positioning Systems (GPS) and field visits to verify the practicality of the proposed and alternative solutions. They will often include Outline Designs, which show the main location and sizing of infrastructure elements and estimate the entire life-cost of the different options to inform the selection of the preferred solution. The **feasibility studies** are more detailed studies that verify the final selection of the proposed solution from among the alternatives considered, and subject it to a technical, institutional, social, and environmental assessment. For small systems, the pre-feasibility and feasibility studies are combined. Works will be procured based on the **detailed final designs** (i.e. detailed engineering designs of the preferred options, including structural and hydraulic calculations and Bills of Quantities).

23. *The actual investment program, the type of solutions, and the villages to be included are known at this stage.* However, a nominal investment program can be found in the technical assessment. The actual investment program will be implemented in line with the GoE National Rural Sanitation Strategy. The nominal investment program assumes that all the projects will be clustered (i.e. relatively large systems will serve a group of adjacent villages). In practice the feasibility studies will determine the optimum mix of: i) household solutions (properly-engineered septic tanks); ii) community solutions such as street or block-shared septic tanks or mini-treatment systems; iii) decentralized systems serving a single village or satellites; and iv) clustered systems.

24. *It is expected that infrastructure works will be packaged as projects that comprise a comprehensive sanitation system (a project will include all the networks and treatment works needed to ensure a fully functioning system).* Each project (i.e. the works needed to deliver a comprehensive sanitation system for a village or cluster of villages) will generally be delivered as a single contract using construction-only contracts based on detailed designs prepared by the ISC. In some cases larger treatment plants may be delivered as design and build contracts.

25. *Considering the expected packaging and grouping of the above activities, it has been determined that the estimated cost of the related procurement processes, that could result in multiple contracts if based on lots, do not exceed the maximum allowed thresholds.* The maximum allowed thresholds are: (1) works, estimated cost of US\$50 million equivalent or more per contract; (2) goods, estimated cost of US\$30 million equivalent or more per contract; (3) non-consulting services, estimated cost of US\$20 million equivalent or more per contract; or (4) consultants’ services, estimated cost of US\$15 million equivalent or more per contract. In order to get an idea of the likely scale of work involved in the above activities, the HCWW, with inputs from the three WSCs, has prepared a nominal investment program of projects based on the

principle of making maximum use of existing sanitation infrastructure. The nominal program used the following simplified criteria: first, to construct additional sewerage networks where existing wastewater treatment plants (WWTPs) have spare capacity and where there are unconnected settlements or households; second, to extend existing WWTPs where an opportunity exists to add new sewerage networks to these treatment plants; and, third, to build new WWTPs and networks in the remaining polluting villages.

26. ***The procurement rules applicable to the Program from a legal and regulatory perspective are internal to the WSCs.*** The HCWW and the WSCs were established by Presidential Decree 135 for the year 2004 and are governed by Law 203 of the year 1991 for the Public Business Sector. The Decree named the Minister of Housing as the Concerned Minister. The Beheira WSC Articles of Incorporation (Charter of Establishment/Mandate) were issued by H.E. the Minister of Housing by Decree 56 for year 2005, the Dakahliya WSC by Decree 59 for year 2005, and the Sharkiya by Decree 58 for year 2005. The Articles of Incorporation of the three WSCs clearly state that the WSCs may build, operate, and maintain plants and networks to provide for potable water and to safely dispose of wastewater.

27. ***The WSCs have the sole mandate of providing drinking water and wastewater services within their area of jurisdiction and they are charged with becoming financially independent.*** The WSCs are affiliated with the HCWW and HCWW is the sole shareholder. The boards of the WSCs are composed of the Chairman, four persons elected by the staff of the company, and four other individuals appointed from the local government (often including the Secretary General of the Governorate), NOPWASD, a university and a technical body (usually either MWRI or HCWW).

28. ***The WSCs are not subject to the provisions of Egypt's Public Procurement Law 89/98.*** While the Procurement Law (89/98) in Egypt establishes that “*the State's Administrative Body Units, inclusive of ministries, departments, bodies having special balances, as well as Local Administration Units, Public Authorities, whether being servicing or economic, shall be subject to its provisions*”, the WSCs have their own internal Procurement Procedures Manual (PPM). A review of the PPMs of the three participating WSCs revealed that they replicate Law 89/98 almost in its entirety (probably reflecting the fact that the State is the sole shareholder). The main departures from Procurement Law 89/98 found in the Procurement Procedures Manual are as follows:

- c) Allowance for a one-envelope system.
- d) Thresholds for WSC officials (Chairman, Head of Sector, etc.) approvals are different in each WSC. However, in all cases the thresholds are significantly higher in the WSCs Procurement Procedures Manuals than in Public Procurement Law 89.

29. ***The findings of the Country Procurement Assessment Review (CPAR), particularly in relation to Egypt's Public Procurement Law, also apply to the WSCs.*** The CPAR in Egypt identified a number of areas that require attention such as: i) a need for improvement of procurement practices at the sector and decentralized levels; ii) although the Procurement Law (89/98) and the Executive Regulations provide important concepts for public procurement and are based on sound principles, they are broad and not always sufficiently clear to allow consistent

application; iii) there is no independent protest mechanism other than an appeal to the Competent Authority; and iv) there is a need to develop a capacity-building strategy and implement it through a systematic training program, with the active involvement of local training providers and the donor community. Although the Government is taking steps to align its Procurement Law with international best practice, significant challenges remain in relation to weak institutional capacity, particularly at the decentralized level, and with respect to inconsistent interpretation and application of the Procurement Law and its regulations. Procurement weaknesses include issues of inaccurate cost estimates, rebidding, excessive cancellation of tenders, price overruns in civil works, and weak contract management capacity. A major shortcoming in the WSCs' procurement procedures is that WSCs do not perform a Post-Qualification process on the nominated contractor. This leads to contracts being awarded to non-performing contractors.

Procurement planning

30. ***There is a disconnect between procurement planning and budget availability.*** Procurement planning for the fiscal year is done before the budget is allocated, and with over-ambitious goals at this stage. The procurement plan is subsequently adjusted to the available budget and the priorities are set by each WSC. Procurement plan implementation accords with the applicable rules and procedures for each procurement method applied in conformity with the PPM. WSCs do their best to consolidate the procurement of goods to achieve economies of scale. DLI-3 under Result Area 2 (Improved Operational Systems and Practices of WSCs), addresses planning instruments as a key area of concern. The detailed Master Plans will include the baseline, the expected scope, and the detailed plans. The Five-Year Plans with project estimates, annual investment plans, and respective procurement plans, are derived from the Master Plans. Improvement in WSC procurement performance, including planning and implementation, is regarded as vital for successfully implementing the investment program. As specified in the Program arrangements, funds will flow from the National Budget to the WSC annual budget as fiscal transfers. Much attention has been focused on ensuring that the WSCs will have the funds available to fulfill the contractual obligations related to financing their capital investment projects, as prioritized in their annual capital investment plans.

Procurement Practices (processes and procedures)

31. ***Procurement rules and procedures are considered broad and are not always sufficiently clear for consistent application.*** Although based on mandatory and enforceable rules set out in the WSC Procurement Procedures Manuals, it is considered that these rules and procedures allow too much room for individual interpretation. This results in inconsistent applications both across and within WSCs. While the advertising of bidding opportunities is required under open competition, it is not required under other procurement methods such as single source and limited competition methods. These other procurement methods are clearly described in the PPM. It should be noted that the procurement method is determined by the estimated cost. The conditions for using the different procurement methods are specified in the PPM.

32. ***Although the WSCs have Standard Bidding Documents (BDs) for all procurement activities (Advertisements through Contracts/Purchase Orders), there is considerable space for improvement. Qualification, evaluation, and award criteria are not sufficiently clear.***

Furthermore, contract conditions need to be improved to achieve a more equitable balance between the employer and contractor rights and obligations.

33. *In order to assess weaknesses and constraints in the WSCs procurement practices, the WSCs were asked to provide, among other things, information on the number, type (goods, services and works), the procurement method (open competition, direct contracting, etc.), and contract amounts for the last five years.* In 2011/2012, the Beheira WSC issued 249 purchase orders (POs) for Supplies and Goods, while in 2012/2013 it issued 175 POs. In 2013/2014 it issued 172 POs varying from the equivalent of US\$100 to US\$1.2 million. Although different procurement methods were followed, reverse adjudication appeared to be used more than other methods. In 2012/2013, the Beheira WSC procured 33 works contracts, of which eight (25 percent) were cancelled. In 2013/2014, 19 works contracts were procured of which two (10 percent) were cancelled, and in 2014/2015 eight contracts were procured. Contract amounts varied from the equivalent of US\$3,000 to US\$6.5 million mostly using a public (open) procurement method. In 2014/2015, there were two Contract Packages that exceeded US\$3 million equivalent.

34. *In the case of the Dakahliya WSC, from 2010 to 2014 63 packages were issued under Limited Competitive Bidding which varied from the equivalent of US\$3,000 to US\$4 million, 12 packages were issued under Local Competitive Bidding which varied from the equivalent of US\$8,000 to US\$260,000, sixty-six packages were issued under National Competitive Bidding varying from the equivalent of US\$15,000 to US\$700,000, and two packages were issued under Direct Agreement varying from the equivalent of US\$1,500 to US\$530,000.* While different procurement methods were adopted, National and Limited Competitive Bidding (129 of 143 packages) were used for most of the procurements.

35. *In the case of Sharkiya WSC, during the year 2012, 45 packages were issued under Limited Competitive Bidding varying, from the equivalent of US\$600 to US\$80,000, eight packages were issued under Local Competitive Bidding varying from the equivalent of US\$1,800 to US\$25,000, nine packages were issued under National Competitive Bidding varying from the equivalent of US\$33,000 to US\$3.5 million, and two packages were issued under Direct Agreement varying from the equivalent of US\$85 to US\$5,000.* While different procurement methods were followed, Limited Competitive Bidding (45 of 64 packages) was used for most of the procurements.

36. *In the case of Sharkiya WSC, during the year 2013, 88 packages were issued under Limited Competitive Bidding, varying from the equivalent of US\$400 to US\$430,000, two packages were issued under Local Competitive Bidding varying from the equivalent of US\$17,000 to US\$70,000, and 29 packages under National Competitive Bidding varying from the equivalent of US\$9,000 to US\$2.6 million.* While different procurement methods were followed, Limited Competitive Bidding (88 of 119 packages) was used for most of the procurements.

37. *In the case of Sharkiya WSC, during the year 2014, 17 packages were issued under Limited Competitive Bidding, varying from the equivalent of US\$1,500 to US\$340,000, 82 packages under National Competitive Bidding varying from the equivalent of US\$3,500 to US\$260,000 million, one package was issued under Direct Agreement for the equivalent of*

US\$11,000 to US\$2.6 million. While different procurement methods were followed, Limited Competitive Bidding (82 of 100 packages) was used for most of the procurements.

Capacity of the construction industry

38. *The PforR envisages a significant expansion in the current turnover of construction activities in the water and wastewater sector.*

39. *An analysis of the construction industry in the water and wastewater sector in Egypt shows that the sector has the capacity to respond to the increased demands posed by the Program.* However, earlier experiences of projects implemented through NOPWASD, IWSP, ISSIPs, and others have shown that there are considerable risks of delay, inadequate quality, and high cost levels. These risks can be managed through the support that the ISCs will provide. The following measures will be particularly important:

- Qualification of contractors (either pre- or post-qualification) and rigorous bid evaluation to ensure that contractors have the necessary technical and financial capacity to carry out the works
- Packaging of contracts to attract the interest of capable contractors and obtain economies of scale.

Controls and Integrity

40. *Since their establishment, the WSCs have been in charge of the operations and maintenance in their areas of jurisdiction, as well as of some rehabilitation works.* This Program will attempt to expand the scope of the WSCs, by having the three selected WSCs take full charge of some contracts for networks and treatment plants in their jurisdictions. This is in line with the provisions of their articles of incorporation.

41. *From a governance perspective, entrusting WSCs with implementing networks and treatment plants is envisaged as conducive to improved performance.* By default, WSCs are responsible for service delivery, billing, and revenue collection. As such, they obviously have a significant incentive to deliver in the most efficient manner. Increasing the number of connected customers would directly increase their revenues. Expedited implementation will mean earlier connection to the network and faster revenue generation and collection. Since WSCs are responsible for operations and maintenance, ensuring the quality of implemented works is in their best interest. This Program will try to capitalize on the inherent incentive of WSCs and to pursue designs that maximize the Program objectives.

42. *Effective internal audit functions should be ensured in the WSCs, with them reporting to the Board through the Audit Committee, to enable a systematic and disciplined approach to evaluating and improving the effectiveness of governance, risk management, and control processes of the companies.* In addition, the Program financial statements will be audited by independent external auditors. The results of these audits should be made public in accordance with the provisions of the financing agreement.

43. *It is considered that the quality control processes are neither sufficiently clear nor effective with respect to upstream activities such as the preparation of designs, specifications and cost estimates.* This is exacerbated by the fact that the WSCs subcontract these activities to outside consultants. Accountability of the WSCs, as well as the need to make complete records of the procurement processes available, is clearly defined in the PPM. This includes established processes for procurement decisions made by the competent authority, which are generally not overruled. It is considered that bidding procedures adequately preserve the integrity of the process since there is a chain of custody of the bids, and evaluations are confidential.

44. *It is considered that the integrity of the procurement process is well safeguarded.* The review and update of Procurement Procedures Manual of the WSCs will assess whether the controls are causing any bottlenecks and whether they can be streamlined. The authority for ratifying procurement actions is currently determined according to the financial authority possessed by the General Manager, Heads of Sectors, the Chairman and the Board in each of the WSCs concerned.

45. *The Office for Monitoring Government Contracting is a complaints handling unit within the MoF that reports directly to the Minister.* The Office was established by Public Procurement Law 89/1998, and PM Decree 3549/1998 reflects its mandate. This Office is responsible for receiving and addressing complaints from Bidders, Suppliers and Contractors relating to Government contracts whether they are at the tendering or execution stage, and that fall under Law 89/1998. However, the WSCs are not in this category.

46. *It is therefore recommended that a complaints handling mechanism be established in HCWW.* Given its role in measuring performance, HCWW is well positioned to take on this additional task.

47. *While there is no evidence of cost and time overruns in the performance of contracts, the level and quality of the consultants selected to prepare the designs and specifications, as well as their involvement in construction supervision, is questionable.* There are established procedures to inspect for quality control of goods at the delivery stage. However, because of inadequate quality assurance processes, it is considered that the procedures for quality control of works can be improved.

ii) The performance of the Program financial management system compared to the critical elements of an open and orderly financial management system

48. *The 2015/2016 budget circular is adopting a gradual transition to “Program and Performance Budgeting” in nine selected ministries, including the MHUUC.* Although the current budget classification does not enable comprehensive tracking of sectoral expenditures (since the budget largely follows an economic classification), the introduction of “Program and Performance Budgeting” in the upcoming 2015/2016 budget, should enable better tracking of the expenditure categories related to a specific sector, program, and subprogram.

49. ***The capital budgets of the water and sanitation sector are allocated mainly as follows:*** for Greater Cairo (Cairo, Giza, and Qualyobeya) and Alexandria, the budgets are handled by CAPWO; and for the remaining governorates they are usually transferred to NOPWASD.

50. ***The Program supported by the PforR operation will include the policy, programming, and investment activities of the Government's rural sanitation program in the selected governorates in the Delta region.*** Within the scope of the Program, expenditures will include studies, capital spending, rehabilitation, capacity building, operations and maintenance, and other Program-related overhead costs.

51. ***For Program budgeting and cash planning purposes, the Ministry of Housing needs to coordinate with the Ministry of Planning and MoF annually to ensure that the Program funds required for each year of implementation are available on a timely basis.*** This should take place during the preparation phase of the annual State budget to ensure that the estimated program budget outlays are reflected in the State budget for the respective fiscal year. The full program budget will be categorized under Chapter 6 of the State budget (Investments, Purchase of Non-financial Assets) and broken down by the relevant sub-headings (e.g. buildings, machinery, equipment, research and studies, etc.).

52. ***Institutional capacity (staffing, budgeting, etc.) to carry out the fiduciary responsibilities under the Program.***

Procurement capacity

53. ***It has been concluded that the three WSCs have adequate staffing in terms of numbers and experience, to implement the current activities, but that they will require strengthening given that implementation of the Program involves additional activities.*** The activities that have been envisaged under the Program go well beyond those that have historically been carried out by the WSCs and are currently being carried out by the WSCs. This will pose a huge challenge because a series of activities currently carried out by NOPWASD are expected to be absorbed by the WSCs. The WSCs lack experience in dealing with activities that involve the design, specifications, procurement, and contract management for main trunk lines and wastewater treatment plants. The WSCs have a project development unit that is in charge of small-scale rehabilitation and maintenance works which, on a limited scale, involves procurement of design services, construction works, and supervision services. The systems and skills needed for financial and contract management of large-scale works have not been developed because the mandate of the WSCs has been limited to operations and small maintenance-related works.

54. ***The Beheira WSC Contracts & Procurement General Administration (CPGA) reports to the Procurement & Warehouse Sector, which in turn reports directly to the Chairman.*** The CPGA is divided into two Administrations:

- a. The Contracts Administration, with seven staff to deal with Works activities, and
- b. The Procurement Administration with 12 staff to deal with Supplies (Goods) activities.

55. ***In total, there are 19 staff in the CPGA, all of whom are university graduates with accounting backgrounds and between five to ten years' experience.***

56. ***The Dakahliya WSC has an entirely different setup.*** It uses a Contract and Procurement Sector (CPS) which reports to the Financial, Commercial, Administrative, and Human Resources Sector that reports directly to the Chairman. The C&PS is divided into three departments:

- a. The Contracts General Administration, which is divided into a Works Administration (sub-divided into a Tendering Section, a Contracts Awards Section, and an Implementation Section), and a Supplies (Goods) Administration (sub-divided into a Tendering Section, a Contracts Awards Section, and an Implementation Section);
- b. The Procurement General Administration, divided into the Direct Contracting Administration and the Procurement by Loans Administration; and
- c. The Contracts Reviews General Administration

57. ***The three departments contain 22 staff, all of whom are university or institute graduates with accounting backgrounds and experience ranging from five to ten years.***

58. ***The Sharkiya WSC CPGA reports to the Financial and Administrative Sector, which in turn reports directly to the Chairman.*** The CPGA is divided into two departments:

- a. The Contracts Administration, which deals with Works activities (sub-divided into a Tendering Section and a Contracts Awards Section Contract Reviews Section); and
- b. The Procurement Administration, which deals with Supplies (Goods) activities (sub-divided into an Offers and Purchase Section and a Contracts Awards Section).

59. ***This CPGA contains 12 staff in the CPGA, all of whom are university or institute graduates with accounting backgrounds and experience ranging from five to ten years.***

60. ***The Beheira Contracts and Procurement General Administration (CPGA) and the Dakahliya Contract and Procurement Sector (CPS) are responsible for coordinating with other WSC departments (Engineering, Technical, Financial, etc.) all the procurement-related activities (from Advertising to Contract Awards).*** The CPGA and CPS are represented in all the committees related to the procurement process. Furthermore, the CPGA and CPS play a major role in Contract Administration and in the processing of Contractors/Suppliers invoices up to the issuance of the Taking Over & Acceptance Certificate. It should be noted that the CPGA operations and database are manually operated, while the CPS operations and its database are electronic.

61. ***The CPGA in the Sharkiya WSC is responsible for, and coordinates with, other WSC departments (Engineering, Technical, Financial, etc.) all the procurement-related activities, from Advertising to Contract Awards. After Contract Awards, the CPGA transfers the Contract file to the Financial and Projects Department for Contract Administration.*** The CPGA's role is limited to issuing Contract Amendments if required during the Contract Implementation phase. CPGA's operations and database are done manually.

62. ***In view of the new role of the WSCs involving carrying out infrastructure investments, as identified in their annual capital investment plan, the issue of weak capacity in the procurement area will be addressed in several ways.*** The Project Management Consulting Firm (PMCF) that will support the PMU will have an overall quality assurance and supervisory role, particularly in relation to final designs and specifications. This will be complemented by the ISC that will directly support the WSCs in preparing designs, specifications, and cost estimates, undertaking procurement and supervising construction.

Financial Management capacity

63. ***Presidential Decree No. 135 of 2004 established the Holding Company for Water and Wastewater (HCWW) and its subsidiaries.*** This operates under the Public Business Sector Companies Law No. 203 of 1991 and its Executive Regulations. Each WSC is established as an Egyptian Joint-Stock Subsidiary affiliated with the HCWW.

64. ***The WSCs are to be directed by a Board of Directors composed of at least five and no more than nine members, including the Chairman of the Board.*** Their selection including of board members for full-time management, and remuneration (including bonuses and attendance allowances, and flat-rate salaries for full-time members), shall be subject to the provisions of the Public Business Sector Law.

65. ***The Board of Directors has the right to appoint from among its members or directors of the company those individuals who will be entitled to sign on behalf of the Company severally or jointly when dealing with specific matters or topics.*** The meetings of the General Assembly of the Company will be attended by the Company's Board Chairman and members and controllers of the Central Agency for Accounts, but these will not have voting rights.

66. ***The Ordinary General Assembly will convene at least twice a year. One meeting will take place three months before the beginning of the FY to examine the Company's estimated budget, and the second meeting will be held with a period of three months after the end of the FY to consider matters such as the Auditor's Report, ratification of financial statements, ratification of the Board of Directors' Annual Report, and reports by the Central Auditing Organization on the auditing of the Company's accounts and assessment of Company performance.***

67. ***The FM Staffing Structure.*** For WSCs, the financial affairs sector is headed by a Sector Head who reports to the Company chair. The financial affairs sector consists of the general directorates of accounting, budget, costing, and audit.

68. ***Budget formulation.*** The WSCs prepare their budget based upon their recurrent O&M costs, capital investments and rehabilitation requirements, and forecasts of sales (water, treatment plants outputs, installation fees, etc.). The WSCs' main sources of funding are the revenue from consumers (billings), other revenues generated from extra services or sales, and Government subsidies to compensate WSCs for water pricing below O&M costs.

69. ***Internal Control.*** Payments for the design and construction activities under the networks and treatment plants construction contracts depend upon different layers of control, whether ex-

ante or ex-post, to review project progress and the validity of payments. These control layers are represented by the site engineers, supervision consultants, the HCWW review committee (in some cases), and the Company's external auditors. The site engineers and the supervision consultants provide ex-ante controls by reviewing physical progress and approving contractors' invoices/billing. In addition, networks ex-post reviews will be conducted through review committees including HCWW technical and financial representatives.

70. ***Financial Reporting and Auditing.*** The HCWW and WSCs are required to prepare annual financial statements in accordance with the Company's Law No. 159 of 1981. These financial statements should comply with the Egyptian Accounting Standards issued by the Minister of Investment Decree No. 243 of 2006. The financial statements are subject to annual audit by the Supreme Audit Institution, known as the Central Audit Organization of Egypt.

71. ***The effectiveness of coordination between agencies where multiple agencies or tiers of Government are involved.***

72. ***Coordination between the various agencies involved will be critical to the success of the Program.*** The MHUUC provides overall water and wastewater sector leadership. The MHUUC sets the sector policy and coordinates the overall investment program for the sector. It oversees a number of specialist agencies and public service companies including EWRA, HCWW, NOPWASD, and CAPWO. The MHUUC will be undertaking a new but temporary function related to preparing, coordinating, and providing oversight of the NRSP. The PMU, which will be part of the MHUUC, will be established for this purpose and staffed accordingly. The PMU is however vulnerable to changes in the top management of the Ministry. It is important the PMU does not take over the roles of the HCWW or the WSCs. Any transfer of the WSC's role to the PMU will risk the PMU very quickly becoming a bottleneck. It is also important that the PMU does not assume the role of the HCWW, which is to provide support to the WSCs in performing their core tasks of providing sanitation services, and of operating and maintaining public infrastructure. Local governments are not directly engaged in the Program but are involved through their membership of the WSC boards.

73. ***NOPWASD, a technical agency under the jurisdiction of the MHUUC, has been historically responsible for investment planning, design and supervision of the construction of water and sanitation infrastructure.*** Works are currently funded through the State Budget. After completion, and at the end of the contractual maintenance period, the facilities are handed over to the HCWW and WSCs for future operation, maintenance, and management. However, under the PforR, this function will pass to the WSCs.

74. ***The Egyptian Water Regulatory Agency (EWRA) regulates, follows up, and monitors all public and private activities related to water and wastewater.*** EWRA was established by Presidential Decree in 2004 and is chaired by MHUUC. The EWRA aims to "enable and encourage projects to achieve the highest level of performance to ensure the sustainability of the service at the required level of quality and efficiency and provide the services to the consumers in a satisfactory mode and at the most reasonable prices" (136/2004.) Tariff adjustment decisions are, however, under Cabinet authority.

Assessment of fiduciary risk

75. ***The financial performance of WSCs is already suffering from operating losses, even with subsidies received through the HCWW (for example, Dakahliya WSC incurred an operating loss of EGP 52 million in 2013/2014.*** Other costs and depreciation increased losses to EGP 174 million). The PforR program aims to address this in two ways. The model of annual capital grants and performance assessment against specific indicators will pressure WSCs to achieve more efficient service delivery and more prudent financial performance. In addition, the predictability of funding and its consistent availability offered by the PforR model will help WSCs achieve their target performance indicators.

76. ***The envisaged significant increase in WSCs' execution of investments involves additional risks for financial implementation and oversight.*** The strengthening of the internal audit departments at WSCs is crucial. The Internal Audit departments should report to the Board of Directors through an Audit Committee, and enable a systematic and disciplined approach to evaluating and improving the effectiveness of governance, risk management, and control processes of the companies. The transparency of financial statements and audits should also contribute to public oversight and hold the implementing entities accountable. HCWW and WSCs annual audits will be published on MHUUC's website.

Governance and Anti-Corruption

77. ***In August 2014, the GoE adopted an administrative initiative aimed at enhancing transparency and integrity in public administration. However, implementation is still at the initial stage.*** This initiative is endeavoring to address complex issues such as the complicated organizational structure of the State, lack of transparency and accountability, and the prevalence of corruption.

78. ***Several entities are responsible for addressing corruption issues in Egypt.*** While some of these entities are required to publish annual reports in accordance with Egypt's 2014 constitution, these reports are not publicly available, since the entities' respective laws have not been yet amended to align with the new constitutional requirements. The main bodies that deal with anti-corruption, whether directly or indirectly include the Administrative Control Authority, the Administrative Prosecution Authority, the Illegal Profiting Apparatus, the Central Auditing Organization, and the General Prosecutor's Office.

79. ***It was agreed that the Program would be implemented in accordance with the World Bank's "Guidelines on Preventing and Combatting Fraud and Corruption in Program-for-Results Financing," of February 1, 2012.***

80. ***The overall fiduciary risk for the Program has been rated as "High."*** While the measures that were identified to strengthen the fiduciary systems and address the gaps through DLIs and in the Program Action Plan, will provide reasonable assurance that the funds will be used as intended in accordance with the Bank's PforR policy, the overall fiduciary risk for the Program has been determined as "High", on the basis of the assessment findings, and particularly considering the weaknesses and constraints.

Fiduciary Elements of the Implementation Support Plan

81. ***Implementation progress and changes in fiduciary risks to the Program will be monitored regularly.*** During the planned supervision missions, compliance with the activities required to address the weaknesses and constraints identified in the FSA will be verified and monitored. As part of the implementation, the PMU will be required to prepare a progress report on procurement indicators before every supervision mission, so that the team can identify together with the client the main issues, and proceed to work on improvement measures during the mission. Fiduciary staff will continue to be fully integrated and work with the task teams to examine the achievement of Program results, the DLIs of a fiduciary nature and the implementation of the PAP.

82. ***Hands-on support, on-the-job training, and capacity building will be provided to the WSCs by the ISC to be selected under the Program.*** In addition, the WSCs will receive ongoing assistance to resolve any implementation issues that may arise.

83. ***The performance indicators will be applied in order to measure the performance of the fiduciary systems and audit reports.*** Data will be collected from the e-procurement portal and analyzed in order to produce the desired indicators.

84. ***The resources required to implement all the agreed actions needed to address shortcomings have been secured through the TA from the WSP that will support the Program.***

Fiduciary elements of the Program Action Plan (PAP)

85. ***This section lists key technical and capacity development measures that aim to increase the operational efficiency of the Program, ensure proper transparency and accountability mechanisms, and mitigate existing fiduciary risks.***

86. ***Rules and regulations.*** The operational and financial management arrangements for the Program should be laid out in regulations and detailed in Procedures Manual. The Procedures Manual should also regulate the budgeting, cash management, accounting, financial reporting, and audit arrangements applicable to the Program. These arrangements should be consistent with the general PFM regulatory framework.

87. ***Internal audit.*** Effective internal audit function should be ensured in the WSCs, reporting to the Board through the Audit Committee, to enable a systematic and disciplined approach to evaluate and improve the effectiveness of governance, risk management and control processes of the companies. As opposed to the transaction-level reviews performed by financial controllers, the internal audit function would focus on:

- Measuring the inherent and residual risks associated with WSCs operations, and planning their audit work program accordingly.
- Using analytical procedures, information system audit and assurance standards, and data mining tools – for which appropriate access to the MIS databases for audit purposes should be secured.
- Undertaking regular spot checks and field visits to validate the continued relevance of internal controls, including the quality of the complaints mechanism.

- Following up on the timely implementation of audit recommendations.

88. **Financial reporting.** The Program financial statements should be subject to periodic and timely reporting. Integrated Reporting will be considered. The financial reports should be publicly available.

89. **External audit.** Program financial statements will be audited by an independent external auditor. The respective audit reports should be made public in accordance with the provisions of the financing agreement.

90. ***Inconsistent application of rules and procedures***

Actions to address shortcomings:

1. Develop and implement a Procurement Procedures Manual to be adopted by all WSCs
2. Develop standard bidding documents to be adopted by all WSCs
3. Improve procurement practices that do not allow bidders to offer discounts after the bid due date, prohibit price negotiations unless allowed for and regulated in the bidding documents (BDs), require that bidders qualifications (financial and technical) be verified prior to contract award, reduce rebidding, etc.
4. Provide training to procurement staff in the WSCs

Outputs

1. Procurement Procedures Manual developed and adopted by all WSCs
2. Standard bidding documents developed and adopted by all WSCs
3. Number of procurement staff trained

91. **Lack of performance information, linked to an inability to collect and interpret data**

Actions to address shortcomings:

1. Ensure that ALL bidding opportunities, bidding documents, bid evaluation results (including on direct contracting), and original and final contract amounts, are advertised in the GoE e-portal: www.etenders.gov.eg.
2. Agree on performance indicators.
3. Collect and analyze data.
4. Provide training to procurement staff in the WSCs.
5. Introduce the concept of Integrated Reporting and support WSCs to prepare Integrated Reporting by the close of the Program

Outputs

1. The number of bidding opportunities being advertised in the e-procurement portal.
2. Data analysis and ongoing application of Performance Indicators
3. Procurement staff trained
4. Time to conclude procurement process by ranges in value (low value contracts ≤ US\$1 million, contracts between US\$1 million and US\$10 million, contracts above US\$10 million)
5. Quantity of processes being retendered
6. The number of contracts awarded on sole source basis

7. Spread between estimated cost, original contract amount and final contract amount
8. The number of contracts subject to cost and/or time overruns

92. Lack of accountability mechanisms such as a functioning complaints mechanism

Actions to address shortcomings:

1. Develop and implement a complaints mechanism
2. Disseminate and promote the usage of the complaints mechanism with the private sector and civil society as a whole.

Outputs

1. Complaints mechanism developed and implemented
2. Complaints mechanism disseminated with the private sector and civil society as a whole.

93. Quality of works including weaknesses in contract management

Actions to address shortcomings:

1. Ensure quality and completeness of designs and specifications including reliable and accurate cost estimates
2. Ensure that the selection of consultants that prepare designs and specifications, as well as those selected to carry out construction supervision, follows a quality cost-based selection process to ensure that they possess the MRs of general and specific experience, as well as the necessary expertise in the respective field.
3. Verify and confirm technical and financial qualifications of contractors
4. Develop and implement a training program for technical staff in the WSCs responsible for quality control and supervision of works contracts.

Outputs

1. Procedures for selection of consultants and procurement of contractors adopted and enforced
2. ISC selected and mobilized to WSCs.

Annex 6: Summary Environmental and Social Systems Assessment

1. ***In general, the local legislation, policies, and guidelines sufficiently address the environmental and social issues associated with the Program, with a few gaps.*** In terms of complying with those standards and integrating them into the procedures of HCWW/WSCs, there are however many gaps. Limited institutional capacity is one of the main drawbacks in the existing procedures of HCWW/WSCs, since many of the required environmental and social measures were carried out by NOPWASD, which left the HCWW/WSCs with limited practical experience in those areas. Furthermore, some issues such as sludge handling and HSE issues require resources that are not readily available in the WSCs. Current procedures and correspondent gaps in complying with national legislation, policies, and guidelines are described and discussed below.

2. ***Environmental Assessment.*** An environmental assessment for projects is required by Law 4/1994, modified by Law 9/2009 or “The Law for the Environment,” which is the main legislation regulating environmental protection in Egypt. It is regulated by the Ministry of State for Environmental Affairs (MSEA) and its executive agency, the Egyptian Environmental Affairs Agency (EEAA). Since the Law went into effect in 1994, significant improvements have been introduced in the environmental legal system utilizing the experience gained in implementing the law during the past 20 years. According to Law 4/1994, the Environmental Impact Assessment (EIA) is a licensing requirement for development projects that are likely to cause impacts on the environment. The existing EIA Guidelines (modified in 2009) include detailed requirements for the EIA process, including social assessment and consultation, and they are compatible with the WBG environmental assessment requirements. The Guidelines are even more stringent than many other international environmental assessment regulations since they consider any sanitation project to be in the highest assessment category, which is not the conclusion reached by the ESSA team as detailed in the ESSA. Regarding the procedures of environmental assessment, the EIA preparation and fulfillment of the EEAA requirements is well-defined in the Guidelines. In addition, EIA approval is well integrated into the licensing system for new projects, especially the sanitation projects. For the sanitation sector, NOPWASD formerly took the lead in undertaking EIAs since it is responsible for the new investments. The WSCs therefore have limited experience and capacity in environmental assessment and in keeping the Environmental Register compliant with Law 4/1994. This gap has been addressed in the PAP.

3. ***Effluent Standards.*** The Nile Protection Law 48/1982 is the main legislation regulating water quality in the River Nile, its two branches, canals, drains, and groundwater aquifers. Although the effluent standards in Law 48/1982 are not highly stringent when compared to effluent standards in other countries, it can be shown, in the context of its application in Egypt, that they are actually very demanding, mainly due to the large amount areas not covered by with sanitation services and to the amount of investments needed to connect those areas to secondary treatment facilities with disinfection.

4. ***Most of the WWTPs in the Program areas are complying with Law 48/1982 standards of effluent quality.*** This is usually verified at the WWTP level through taking daily samples from the influent, effluent, and different points in the treatment stream. When water quality issues arise there is direct coordination to improve the operation at the problem area and to return them to meet the standards. Such plants usually meet the effluent quality standards except for a few cases where some operational problems arise.

5. ***On the other hand, there are some WWTPs that are known for being non-compliant with the effluent standards for different reasons.*** The common reason is that those WWTPs require investments for major repairs or extensions in order to be able to provide sufficient treatment. Some of the overloaded WWTPs, which face operational problems, tend to bypass the discharges that exceed effective capacity to the drain. This is not a documented procedure or a technical recommendation, but some WWTP managers tend to do this to maintain their effluent quality as high as possible, especially when the bypass line, or the discharge outfall to the drain, are not monitored, but inspection bodies usually take effluent samples from the effluent collection point after chlorination. Furthermore, some WSCs connect villages to PSs which are not connected to WWTPs due to a lack of funding for the construction of force mains, so these PSs discharge untreated sewage to drains. This is defined as “negative discharge” and is one of the shortcomings addressed by the PAP.

6. ***Handling of Sludge.*** The handling of sludge generated at WWTPs is regulated through Law 93/1962 and the Executive Regulations by Decree 44/2000. The Law states that if the dried sludge is to be used as organic fertilizer, it must meet certain standards, otherwise it should be landfilled or safely incinerated. Although these standards are generally equivalent to international sludge standards, they are not applied in practice. As described in the PAP, WSCs do not monitor the sludge quality as required by Law 93/1962 and Decree 44/2000 before selling it as fertilizer.

7. ***Management of Sewerage Networks.*** Connecting households and commercial industrial facilities to the sewerage networks is controlled by Law 93/1962 and Decree 44/2000. The Law sets standards for wastewater parameters (e.g. what could be accepted in the network), meaning that industries and commercial establishments generating high load wastewater should install pretreatment units for their wastewater before discharging it into the sewers. While these standards are frequently monitored for industrial establishments, inspections are not carried out as frequently for commercial establishments and are rarely done for animal barns and farm slurry, which is most relevant to the rural areas covered by the Program. The design and operation of networks and pump stations are regulated through the Engineering Codes issued by Decrees 286/1990 and 268/1997 respectively. The Codes set out the standards that should be applied during the design, construction, and operation of networks and PSs to avoid blockage, seepage, structural collapse, hydraulic and electromechanical malfunctioning, etc. Private networks are not allowed, unless they are licensed by the regulatory authority and fulfill the Engineering Codes requirements. Regulatory bodies however find it difficult to prevent private networks, such as those built autonomously by some villages and which end at watercourses.

8. ***Handling of Septage.*** According to Law 48/1982, the discharge of septage evacuated from individual septic tanks and cesspits into freshwater canals or drains is not allowed, but in terms of application, the implementation of the provisions of the Law has met little success due to the difficulty of enforcing it. The septage is normally removed from cesspits in unserved areas by local contractors using tankers which subsequently discharge the septage into the nearest location (e.g. an agriculture drain or even into freshwater canals). Most WSCs do not allow septage to be discharged into their sewers and WWTPs, since no system exists for regulating septage discharges. WSCs are generally unwilling to accept septage with high organic loads that would add to the shock loads received in WWTPs and could affect their performance and the quality of the final effluent. The lack of an official system to handle septage, although helping to reduce shock loads

at WWTPs level, risks not attaining the objectives of sanitation projects on surface water quality, since the unregulated small-scale septage discharges into surface water will continue to be one of the major pressures on water quality. One of the Program results is therefore to improve on-site sanitation and introduce an official system to serve remote areas and satellites. This system will be identified during the feasibility studies for each governorate.

9. **Handling of Hazardous Substances.** The handling procedures for hazardous substances and waste are set out in appropriate detail in Law 4/1994. The handling of chlorine cylinders, which are the most common hazardous substances handled within WWTPs, is further detailed in the Engineering Code for Wastewater Treatment Plants (Decree 169/1997). The Engineering Codes for fire protection include adequate measures for safeguarding against fire risks. However, in terms of application, some of the facilities' designs do not comply with these safeguards, and safety issues sometimes arise during operation. The PAP includes measures to resolve these issues by including H&S standards in the ToRs for the design works and allowing H&S staff to review and verify the designs.

10. **Solid Waste Management.** Solid waste is usually accumulated in screens of WWTPs and PSs and is separated in grit removal chambers. The separated solid waste should be appropriately handled by the facilities. Solid waste management is regulated by specific articles set out in Law 4/1994 as well as in the General Cleansing Law 38/1967. In terms of application, WSCs usually do not adequately collect and dispose of solid wastes at licensed sites. This shortcoming has been addressed in the PAP.

11. **Health and Safety.** The Labor Law (Law 12/2003), the main legislation regulating H&S issues, includes a chapter on the work environment and health and safety issues. It also carries a comprehensive annex on safety standards intended to minimize physical, dynamic, biological, and chemical risks. Notwithstanding the existence of standards aimed at minimizing occupational health and safety risks, the H&S departments in the WSCs in practice do not have sufficient manpower to monitor, audit, and ensure that sanitation facilities meet these standards. Many construction contractors, for example, often fail to comply with H&S requirements and close supervision of works is required to ensure construction safety. This shortcoming has been addressed in the PAP.

12. **Cultural Heritage.** Law 117/1983 covers the protection of antiquities and culturally-valuable sites. Since Egypt has one of the world's richest store of antiquities from ancient civilizations, the GoE places high importance on their protection and preservation. The Law includes provisions for protecting the structure of known and still-unknown antiquities by setting forth specific procedures for chance finds. The Law provides adequate safeguards against negative impacts during the construction phase of the Program interventions (and the Antiquity Authorities are closely inspecting registered sites to ensure that they are protected).

13. **Land Tenure and Laws on Land Expropriation in Egypt.** There are three main forms of land ownership in Egypt: public or State land (*Amlak Amiriya* in Arabic), private land (*Mulk horr*), and *waqf* land (land held as a trust/endowment for religious or charitable purposes). Article 33 of the 2014 Constitution provides that "the State shall protect the three types of ownership: public, private, and cooperative." Article 35 of the Constitution also provides that "private properties shall

be protected, and the right to inheritance thereto is secured.” The Constitution (Article 63) states that all types of involuntary relocation using force or excessive violence is banned, and violators of this Article will be dealt with by the Courts”. Law 10 of 1990 on Expropriation of Ownership for Public Interest regulates cases where private land is needed for public interest projects. Expropriation of property is further regulated by Law 59 of 1979 on the Establishment of New Urban Communities, and Law 3 of 1982 on Urban Planning. The term “public interest” in an expropriation context is defined in Article 2 of Law 10/1990, which covers, inter alia, water supply and sewage projects. Law 10/1990 describes the expropriation procedures, starting with a declaration of public interest pursuant to a Presidential Decree, accompanied by a Memorandum on the required project and a complete plan for the project and its buildings (Law 59/1979 and Law 3/1982 provide for the Prime Minister to issue the Decree). The Decree and the accompanying Memorandum must be published in the Official Gazette, with a copy (of the Decree) displayed for public viewing in the main offices of the local government unit concerned. Several operational steps follow before the land is finally acquired. At the central level, the Government agency responsible for implementing the land expropriation in the public interest is the Egyptian General Authority for Land Survey (“ESA”). ESA is charged with the formation of the expropriation and compensation committees. The executing body could be another Ministry (e.g. the Ministry of Housing) or a Governorate. This executing body would accordingly be responsible for paying compensation to affected groups through ESA (or under its supervision), offering alternative resettlement options, and implementing the resettlement project. At the local level, several local departments and directorates should be involved in the resettlement program depending on the type of program to be implemented and the type of the land ownership. Although Law 10/1990 does not clearly specify that lessees could be entitled to compensation, the lessees implicitly belong to the group of “rights holders” referred to in this Law. It is clear, however, that lessees may not have recourse against the landlord for the termination of their lease agreements as a result of the expropriation act. Another important issue that has not been addressed in Egyptian law is the right of squatters to claim compensation in the event of displacement or resettlement. Egyptian legislation does not recognize squatters’ rights. However, Egypt’s experience in dealing with this issue demonstrates that due to political pressure and the importance of the social dimension, the Government has been forced to provide alternatives for these groups of households, in terms of alternative shelter, cash or in-kind (e.g.; jobs) compensation.

14. ***Land acquisition procedures.*** When a rural sanitation project is being planned and land is needed, priority is usually given to obtaining State-owned land in order to avoid negative resettlement impacts on the population. In the event of State-owned land being unavailable, there are four other ways of obtaining land for pumping stations and WWTPs: *i) voluntary land donation, ii) a community contribution, which is a very common approach for siting pumping stations; iii) willing buyer-willing seller approach; and iv) acquiring land through the use of eminent domain.* The WSCs are not closely involved in the process of finalizing land purchases (willing buyer-willing seller approach) for pumping stations and WWTPs because the responsibility for investment in sanitation projects is officially mandated to NOPWASD. Although there is no legal obstacle to the WSCs undertaking land acquisition through purchase and donations, the WSCs’ shortage of resources often restricts their ability to do so (especially land purchasing). Donated land or land obtained because of a community contribution, for building pumping stations, is a more common experience of the WSCs compared to purchasing for WWTP. The Properties Department, under the Legal Department within the WSC, is responsible for the

land purchase (in the very few cases of WSCs involvement in land purchase) and for accepting donated land or land obtained through community land contributions for pumping stations. For WWTPs, the land is obtained mainly through the willing buyer-willing seller method. WSCs are reluctant to employ eminent domain to acquire land because it could take much longer.

15. ***Decrees and procedures for regulating households' connection fees.*** Under Law 27/1978, the cost of household connections is the responsibility of the beneficiary. According to the WSCs, the exact amount that each household is requested to pay depends on the distance of the house from the main source, the number of houses participating in the communal inspection chambers, and the amount of works and material associated with each item. It is roughly estimated that each household should pay an average of EGP 1300 to EGP 1500 to get the building connected to the public sanitation network once a project is completed in the area. These connection fees can be in some cases as much as EGP 3000.

16. ***Procedures for engaging with communities.*** Previously, HCWW was not heavily involved in planning and preparing rural sanitation projects. The formal role of the HCWW and the WSCs is more focused on O&M. There is no structured mechanism for carrying out communities' needs assessments for sanitation projects, or for engaging communities in the planning of projects. In cases where private land for pumping stations or WWTP is needed the WSCs play a more technical and legal role. Social aspects related to land are relatively neglected. During project construction (especially the construction of networks), the WSCs supervise the contractors. Monitoring the construction process is a technical matter. Social issues that may arise (e.g. damage to structures) are handled reactively. There is no local grievance system or systematic method for consultations with local communities during construction. During project operation and maintenance, the HCWW and the WSCs possess several key mandates that involve community engagement in the project operations and maintenance. Awareness raising, measuring community satisfaction (part of project monitoring), and handling grievance mechanisms are the key relevant activities that are supposed to ensure community engagement during project operation.

17. ***Procedures for Redressing Grievances.*** The Hotline is one of the key formal grievance channels and is designed to be the single official channel. The HCWW is working to strengthen the Hotline system, including the call centers within the WSCs, and aims to make this channel the only official one for receiving complaints. However, in practice most complaints are still being sent through informal channels including verbally to laboratory staff, maintenance service staff, security, commercial personnel, or the media. These informal channels maintain no accurate documentation or records on complaints received or dealt with.

18. ***Risk screening against OP9.00 Core Principals.*** A preliminary risk assessment has been carried out using the Environmental and Social Risk Screening Format included in OP 9.00, and the likely environmental and social effects have been addressed. Since the Program will be implemented in rural areas suffering health, economic, and psychological pressures, and also in polluted watercourses in the downstream of the Nile, the interventions are expected to effectively address the geographic shortcomings. No sensitive habitats are located within the Program areas, and the risk to culturally valuable sites is low. In terms of sustainability, the Program is expected to enhance the sustainability of watercourses by enhancing their quality, and the sustainability of agriculture lands by alleviating the rising groundwater table problems as well as by improving the

quality of irrigation water. In terms of institutional complexity, the environmental and social issues will be handled by different bodies under the MHUUC umbrella and the system is expected to operate without complexity. Although institutional capacity is currently limited, the PAP identifies measures for capacity improvement. There are no governance or corruption risks associated with the environmental aspects of the Program. The overall environmental risks have been rated as "Medium" and the overall social risks have been rated as "Substantial."

19. ***The overall impact of the Program is expected to be positive.*** The Program will allow for adequately discharging and treating large amounts of sewage according to the standards set by Law 48/1982. Prior to the Program, the sewage was being inadequately collected and discharged to watercourses.

20. ***The environmental benefits include providing adequate treatment to about 90,000 m³/day of sewage that was formerly inadequately discharged to watercourses.*** This treatment regime will improve health conditions to Program beneficiaries and help alleviate the rising groundwater table problem. Septage management will form part of the interventions.

21. ***The main environmental risks are: improper handling of sludge (substantial), improper handling of solid wastes separated at WWTPS and PSs (medium), discharging noncomplying effluent (medium), the safety of workers and neighbors of WWTPs handling chlorine, diesel and laboratory chemicals (medium), sewerage blockages/leakages during operations, especially private networks (medium), integrity of structures during dewatering operations (medium) and improper handling of chance-find culturally-valuable objects (low).*** Furthermore, the limited institutional capacity of the WSCs poses a substantial risk of inadequate Program implementation.

22. ***The main environmental impacts are changing land use in the PS and WWTP footprints, temporary impacts during construction, and impacts on lands caused by receiving waters from compliant effluent, sludge, and solid waste.*** These impacts are considered of low significance.

23. ***Social Benefits, Risks and Impacts.*** The implementation of the Program will help alleviate the negative impacts by providing a sanitation service that the poor rural communities of the targeted Governorates urgently require. It is expected that the Program will produce several important benefits and positive returns for local communities, including:

1. Economic savings at the household level
2. Health and safety benefits
3. Creation of an enabling environment for community development at village level
4. Enhanced public hygiene awareness
5. Special benefits for women and children
6. Creation of jobs at the villages level

24. ***The project will entail land acquisition for constructing the pumping stations and the WWTP.*** If not handled carefully, land acquisition might result in serious impacts on individual landowners and land users. At this stage, since the technical design of the Program is at an early stage, it is difficult to know the exact amount of land that will be needed. Therefore, it is also difficult to estimate the number of landowners and land users who would be affected by the land

transaction process. The severity of the impact of land acquisition depends on a number of factors, and case-by-case analyses will need to be carried out by the WSCs before Program implementation in order to define the magnitude of the impacts, the affected persons, and methods for mitigating the impacts. The main land-related risks that have been identified are:

Limited capacities of the WSCs to manage land issues:

1. Potential delay caused by land acquisition issues
2. Lack of a consistent and transparent approach to managing land-related issues
3. Livelihoods risk related to lands
4. Poor management of the temporary impacts related to land

25. ***The following are the key non-land related risks identified:*** 1) risk of damage associated to construction activities; 2) non-land-based livelihoods risks; 3) weak demand, acceptance and readiness for projects in certain communities; 4) risk of social tensions resulting from exclusion of certain villages; 5) risks of lack of affordability by poor households; and 6) potential escalation of unresolved community concerns/complaints.

26. ***On the impacts side, a number of negative impacts might result from the construction phase of the project.*** The most important include temporary impacts on land, including the temporary use of land for construction camps and storage of materials; the potential damage to crops; permanent land acquisition; and the potential impacts on the livelihoods of affected rural families. There are also potential impacts related to the inconvenience to local communities, and on local activities in the villages (e.g. on local businesses) during the construction phase.

27. ***Performance of WSCs with regard to the Legal and Regulatory Framework on Environmental Aspects.***

The main shortcomings can be summarized as follows:

- There are no clear guidelines to control the management of septage
- Although there are legal restraints on establishing private sewers that discharge to watercourses, there are no enforcement mechanisms or alternative solutions to these networks. While such networks have important benefits for the villages served, the legal framework and technical guidelines do not allow for a sound solution. The Program design would allow for connecting those networks, with a due diligence assessment of their conditions, through the ISC, and for taking feasible measures to improve them. There are no explicit standards for land contamination, and no explicit requirements for ensuring secondary containment of hazardous substance storage tanks (110% of storage capacity), and for taking adequate precautionary measures while filling the tanks. This shortcoming would be addressed by including appropriate requirements in the ToRs of site-specific ESIA's, to be prepared and supervised by the WSCs.

28. ***In terms of implementation of, and compliance with, the relevant laws and standards, there are some weaknesses and gaps in the system including:***

- The strict punishment of non-compliant WWTPs operators sometimes leads to opposite results (i.e. operators tend to bypass a portion of the received influent in order to meet the effluent standards).

- The “negative discharge” by PSs, although done as a last resort in the absence of sufficient financing, should be assessed according to the advantages and disadvantages of starting the connections without having sufficient resources to discharge the collected wastewater in a WWTP.
- Most WWTPs do not keep a suitable environmental register, frequently updated according to the requirements of Law 4/1994.
- Most WWTPs do not handle sludge, solid waste removed by screens, or remove grit according to the requirements of the law. This needs to be improved, as indicated in the PAP.
- Safety procedures need to be improved and integrated within the procedures for design, construction, and operations of networks and WWTPs.

29. ***Performance of WSCs with regard to the Legal and Regulatory Framework on Land Acquisition.*** The existing laws and regulations have a number of positive features with regard to land acquisition, most importantly including provisions related to compensation, sharing information with affected persons, the rights of affected persons to appeal, and provisions related to temporary damage and associated compensation. A review of the legal and regulatory framework set against international best practices reveals several shortcomings in the following areas:

- Consultation with affected individuals
- Identification of entitled categories
- Absence of a proactive local level mechanism for handling grievances
- Land Valuation Process
- Replacement Cost
- Performance of WSCs with regard to the legal and regulatory framework on grievance mechanisms.

30. ***Adequacy of Institutional Arrangements and Land Acquisition Capacity.*** The analysis of the existing institutional arrangement and capacity for handling land acquisition issues showed a number of shortfalls and gaps that need to be addressed to allow for a more standardized approach to land acquisition. Most importantly, the predominantly technical and legal methods used to handle land acquisition generate increased costs for managing land-related social issues. This could be attributed to a substantial lack of capacity, a shortage of human resources, and unclear institutional mandates. The absence of an inter-agency coordination role to facilitate the process of obtaining approvals results in very substantial delays in finalizing land acquisition.

31. ***Adequacy of Institutional Arrangements for Handling Community Engagement Issues.*** The institutional assessment on handling community engagement showed that existing resources and mechanisms for managing community engagement have several strengths, including: availability of teams for awareness and communication initiatives at the Governorate level; teams working under agreed annual work plans; the existence of an M&E system for the assessing the performance of the WSCs; the existence of several community-based monitoring techniques (e.g. surveys); and the existence and application of solid awareness and communication guidelines. Certain institutional gaps were identified which can be summarized as follows:

- Limitations in the mandates of the WSCs' scope and capacity
- Shortage of human resources and staff at the Markaz and village level
- High staff turnover rate
- Lack of monitoring systems to measure the impacts and the efficiency of the implemented community-based activities, including awareness rating
- Lack of resources for logistical support
- Inconsistent capacities of the assigned teams

32. ***Adequacy of Institutional Arrangements for Handling Grievance Redress.*** The following are the main identified gaps related to the existing grievance mechanism, specifically the Hotline:

- Deficiencies in the mode of operation due to lack of automation of the system
- The informal channels (including direct complaints to technicians) are still used in preference to the Hotline.
- Problems in the monitoring system: monitoring is done only in selected cases because, due to database shortcomings, the HCWW does not have full access to all the calls.
- The time lag for resolving complaints is not clearly communicated to complainers.
- Operation and maintenance issues take precedence over grievance issues focused on project planning, design, and construction.

33. ***Recommended Actions to Address Identified Risks and Gaps.*** The ESSA has developed a PAP aimed at the gaps that have been identified. This is presented in more detail in the ESSA document and in Annex 8 of the PAD. Training and capacity building will be key prerequisites to enable the assigned teams to carry out their responsibilities as stipulated in their ToRs. The Bank will provide support during the various stages of PAP implementation and the capacity-building program.

Annex 7: Integrated Risk Assessment

ARAB REPUBLIC OF EGYPT: SUSTAINABLE SANITATION SERVICES PROGRAM FOR RESULTS

PROGRAM RISKS			
1. Technical Risk	Rating:	SUBSTANTIAL	
<p>Description: The overall risk is rated “Substantial,” given that the rating is expected to reflect risks prior to the mitigating activities. The risk can be broken down into the following categories:</p> <p><u>Result Area 1:</u> Inability of the WSCs to develop enough capacity in the relatively short start-up timescale to procure and manage many medium to large projects, and more importantly to develop the ability to manage a program of infrastructure projects as a program rather than as a multitude of individual projects. Furthermore, there is the risk related to the capacity of the new PMU to supervise and coordinate such a large program, and the danger of lack of clarity between the role of the PMU and the role of the HCWW and the WSCs. (This risk relates to all of the result areas.)</p> <p><u>Result Area 2:</u> The PforR supports an institutional transformation of the sector. This is associated with inherent risks related to the changes in roles, responsibilities, and accountability framework. The PforR assumes that the incentives will be effective and that staff involved at all levels of implementation will be incentivized to deliver results; this may not be the case due to a lack of performance-based culture within these government organizations. Although there are performance-based reward systems in place, these will not necessarily provide sufficient incentives.</p> <p><u>Result Area 3:</u> Important tariff increases would be needed over the next few years if the operation and maintenance of the new infrastructure is to be sustainable. However, tariff increases may be delayed or blocked.</p>	<p>Risk Management: The PAP will include a specific activity for each Result Area in order to cover all the mitigation measures. The PAP will include a specific activity in both the TA and the ISC terms of reference to help the WSCs to develop a strong understanding and ability in project and program management. The Program is designed around providing capacity-building support and establishing the right tools, including through separate technical assistance (for example from WSP). DLIs are designed to provide incentives to mitigate these technical risks.</p>		
	<p>Resp: All key stakeholders, in particular: WSCs, HCWW, PMU/MHUU, IVA</p>	<p>Stage: preparation, implementation</p>	<p>Due Date: throughout implementation</p>

1.2 Fiduciary Risk	Rating:	HIGH		
<p>Description: The fiduciary risk has been rated as high for several reasons, namely (i) the need for improvement of procurement practices by the WSCs which will be a critical element required for successful implementation of the investment program, (ii) inconsistent interpretation and application of rules and procedures, (iii) insufficiently clear qualification, evaluation, and award criteria by WSCs; and (iv) the lack of an independent protest mechanism other than an appeal to the Competent Authority.</p>	<p>Risk Management: Procurement performance is being addressed under the DLIs which includes minimum time to conclude the procurement process by ranges in value, quantity of processes being retendered, spread between estimated cost, original contract amount and final contract amount and percent of contracts subject to cost and/or time overruns. The PAP includes the requirement for i) a Procurement Procedures Manual (PPM) as well as the Standard Bidding Documents (SBDs) to be developed and adopted by all WSCs; ii) procurement staff trained, iii) all bidding opportunities, bidding documents, bid evaluation results, including on direct contracting, estimates, original and final contract amounts to be advertised in the GoE e-portal: www.etenders.gov.eg; iv) a complaints handling mechanism to be developed and implemented in the holding company. The new program design addresses the funding and accountability challenges. The model of annual fiscal grants and performance assessment against specific indicators will pressure WSCs to achieve more efficient service delivery and more prudent financial performance. In addition, the predictability of funding and its consistent availability offered by the PforR model will help WSCs in achieving their target financial indicators.</p>			
	Resp:	Stage: preparation and implementation	Due Date : most within 9 months of effectiveness	Status: not yet due
1.3 Environmental and Social Risks	Rating:	SUBSTANTIAL		
1.3.1 Environmental Risk	Rating:	Moderate		
<p>Description: The overall environmental effect of the Program is expected to be positive given that the significant amount of wastewater, which is currently being discharged untreated into watercourses, will be adequately collected and treated and households' access to improved sanitation for households will be expanded in the Program areas.</p> <p>Description: The environmental risks are improper handling of sludge (substantial), improper handling of solid wastes (medium), discharging noncomplying effluent (medium), safety of workers and neighbors of WWTPs from handling chlorine, diesel and lab chemicals (medium), sewerage blockage/leakage during operation especially private networks (medium), structural integrity during dewatering operations (low), improper handling of chance-find culturally-valuable objects (low), and limited institutional capacity of the WSCs (substantial).</p>	<p>Risk Management: The PAP includes measures for institutional capacity building for the implementing agency, adding standard procedures for handling of sludge and solid wastes, controlling effluent quality, upgrading health and safety conditions, proper handling of hazardous substance control and supervision of construction activities.</p>			
	Resp: Client (responsibilities distributed as in the PAP)	Stage: preparation and implementation	Due Date: most within 6 months of effectiveness	Status: not yet due

1.3. 2 Social Risk	Rating: Substantial			
<p>Description: Risks related to land acquisition A number of risks related to land were identified including the potential delay in the time scheduled as a result of land acquisition because of the lengthy land acquisition process, the lack of a consistent and transparent approach in managing some of the land acquisition approaches and the livelihoods risks related to land acquisition. Moreover, the WSCs have relatively limited capacity to manage land issues.</p>	<p>Risk Management: The PAP includes measures for addressing the risks related to land. This includes developing a standardized and consistent approach to land acquisition to ensure that land acquisition is handled through proper consultation and disclosure to reduce any potential social strife, conflict, or impacts on livelihoods as a result of the land acquisition. This will be achieved through developing a Standard Operating Procedure (SOP) for managing land acquisition, issuing a MoU to relevant line Ministers to mainstream the land acquisition process, assigning the relevant teams and building their capacity. Associated actions (for example a Ministerial Decree) might be also considered to ensure that the proposed streamline procedures under the SOP are moving towards application.</p>			
	<p>Resp: Client (responsibilities distributed as in the PAP)</p>	<p>Stage: Preparation and implementation</p>	<p>Due Date: Per action stipulated in PIAP and APA (TBD)</p>	<p>Status: not yet due</p>
<p>Description: Other social risks The overall impact of the Program is expected to be positive on both local communities and the environment. The Program is expected to bring significant positive returns to women and other vulnerable groups (poor households, elderlies, and children). The identified social risks are mainly: a) the risk of damage associated to the construction activities, b) weak sense of ownership to the projects in certain communities c) risk of social tensions as a result of exclusion of certain villages, d) risk related to the inability of poor households to afford the cost of the connection and e) risk related to potential escalation for unresolved community concerns/complaints because of the absence of a structured proactive consultation system and the lack of a robust grievance system at the village level, specifically for handling planning and construction.</p>	<p>Risk Management: Enhancing the system for engaging with communities and addressing social risks will be ensured through number of measures that will be implemented through the WSCs. A DLI was designed and will be dedicated to the completion of citizen engagement system. This will entail: developing a “Procedural Guidelines for Community Engagement”, strengthening the GRM, establishing a strategy for ongoing consultation and transparent information sharing, establishing a pro-poor strategy to support the poor households in accessing the project, enhancing the M&E system, assigning the appropriate staff to handle community engagement and building their capacity on various dimensions. All the proposed measures will be designed in sensitive manner to ensure that women and other vulnerable groups are not adversely affected by the Program impacts and/or are more limited than others in their ability to take advantage of a Program’s benefits</p>			
	<p>Resp: Client (responsibilities distributed as in the PAP)</p>	<p>Stage: Preparation and implementation</p>	<p>Due Date: Per action stipulated in PIAP and APA (TBD)</p>	<p>Status: not yet due</p>
1.4 Disbursement-Linked Indicator Risks	Rating: SUBSTANTIAL			
<p>Description: The achievement of the DLIs depends on the timely completion of the household connections and the results of the annual performance assessment.</p>	<p>Risk Management: A careful cash flow analysis has been conducted to ensure that the PforR funding allocation is aligned with the expected WSC capital requirements. The timely allocation and disbursement of the Base grant will ensure sufficient funds for the completion of the household connections. In addition, a Program agreement between the MHUCC and WSCs is formulated and details the roles and responsibilities of both in the timely and robust administration of the annual performance assessment.</p>			

<p>The risk is misalignment between the capital requirements for expansion of connections and the DLI disbursement levels leading to an issue of access to finance on the part of the WSCs.</p> <p>Another risk is also the misalignment between achievement of results and funds flow between various levels of Government.</p>			
	<p>Resp: MHUCC and MoF</p>	<p>Stage: Preparation and Implementation</p>	<p>Due Date :December 31, 2015</p>
<p>2. OVERALL RISK RATING</p>			
<p>SUBSTANTIAL</p>			

Annex 8: Program Action Plan

ACTION DESCRIPTION	DLI*	COVENANT*	DUE DATE	RESPONSIBLE PARTY	COMPLETION MEASUREMENT**
TECHNICAL DESIGN MEASURES					
Legal Agreements (e.g. a Program Agreement) between PMU and participating WSCs in place establishing mutual obligations, including use of Performance Based Capital Grants as the mechanism for financing the investment program role of PMCF in the supervision of investments.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	June 17, 2015	PMU, HCWW and participating WSCs	Agreements between PMU, HCWW, and WSCs established and operationalized.
The POM provided to the Bank for No Objection.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	3 months after effectiveness	PMU, HCWW and participating WSCs	Bank No Objection Provided
GOVERNANCE AND FINANCIAL MANAGEMENT STRENGTHENING					
The Procurement Procedures Manual (PPM) as well as the Standard Bidding Documents (SBDs) developed and adopted by all WSCs and procurement staff trained.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	9 months after effectiveness	MHUUC	PPM developed and adopted by all WSCs SBDs developed and adopted by all WSCs Procurement staff trained
All bidding opportunities, bidding documents, bid evaluation results, including on direct contracting, estimates, original and final contract amounts are advertised in the GoE e-portal: www.etenders.gov.eg	<input type="checkbox"/>	<input checked="" type="checkbox"/>	9 months after effectiveness	WSCs	Verification that all relevant information is being published in the GoE procurement portal
Program financial statements will be audited by the Central Auditing Organization of Egypt subject to agreement with the CAO representatives, with terms of reference that will also include verification of the DLIs. The results from these audits should be made public as per the provisions of the financing agreement.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Annually	CAO	
ENVIRONMENTAL AND SOCIAL MEASURES					
The institutional set-up of the Program should be strengthened at the WSC level based on agreed staff skills and the development of comprehensive ToRs for a senior environmental specialist and a senior social specialist to be hired under each WSC.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Within 6 months after Program effectiveness	MHUUC	Environmental and Social specialists recruited at each WSC
The performance evaluation system should be strengthened through the establishment of a performance based monitoring system to evaluate performance of technical, fiduciary, environmental, and social teams assigned to the program.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Within 6 months after Program effectiveness	PMU, WSCS and ISC	Performance evaluation systems developed and implemented.

Annex 9: Implementation Support Plan

1. ***Implementation of the Program will require considerable focused support from the Bank team.*** This Program has the ambition of delivering on the promise of better sanitation services while at the same time proving the merits of a decentralized delivery structure to a government that is, for the first time, exploring the system of performance-based fiscal transfers. In order to succeed, the Program will require more than just financial incentives (DLIs). The Bank will need to deploy significant resources and a multidisciplinary team with the right skills and behaviors to facilitate and inspire change. Our facilitating role will be critical to making this work.
2. ***One challenge will be to coordinate the actions agreed in the Program Action Plan with operational activity on the ground, ensuring that information flows effectively between the Ministry of Housing, Utilities and Urban Communities (MHUUC), in particular, and the PMU, HCWW, and the WSCs.*** While channels of communication are generally good between the HCWW and the WSC, the PMU is a new entity. In addition, there will be a significant flow of new information to governorates during the early stages of the Program relating to the PforR Program and to the additional focus on sustainable sanitation systems. At the WSC level, the utilities will need to make a rapid shift in the focus of their planning to ensure that available funding can be absorbed and results delivered in time and within expected budget envelopes. The team recognizes that the PforR mode of operation, which transfers performance risk to the implementing agents and focuses on a new service delivery model, presents a challenge to change numerous operational practices and norms, particularly at the local level.
3. ***Bank implementation support will be focused on implementation quality and on making the results-based incentive system work to its full potential.*** This will include: (a) reviewing implementation progress (including that of the Program Action Plan) and achievement of Program results and DLIs; (b) providing support on resolving emerging Program implementation issues and on building institutional capacity; (c) monitoring the adequacy of system performance, and monitoring compliance with legal agreements; (d) supporting the Government in monitoring changes in risks; and (e) providing ongoing technical support through the WSP and exploring all avenues to enhance capacity building for the WSCs, HCWW and the PMU, as well as for strengthening citizen engagement.
4. ***The key to effective implementation support will be its coordination with critical points in the timeliness of planning and verification of results for payment requests to the World Bank.*** The first implementation support mission will take place as soon as possible after Board approval to provide direct feedback on the quality of governorate level plans and their likely acceptability. This will include a review of the terms of reference for key consultancies, including the Performance Improvement Action Plans and the various annual performance assessment plans and the capacity-building measures under development, as well as the designs for rural sanitation schemes and the planning for institutional strengthening. It is critical to have the early involvement of technical experts in addition to the environmental, social, and fiduciary teams. In particular, the technical team should involve experts in utility reform, sanitation, behavioral change, regulation, and community participation. Subsequent implementation support may involve a stronger emphasis on verification/M&E skills.
5. ***In addition, the WSP of the World Bank is providing a programmatic series of Technical Assistance (TA) in the value of US\$3.5 million.*** This Programmatic support will complement the WBG PforR lending operation and support the Government of Egypt during 3 years (July 2015 to June 2018) to strengthen the capacity and autonomy of national and local public service providers

to deliver sustainable rural sanitation services, especially to the poor through specific Technical Assistance (TA) and Economic Sector Work (ESW) provided to the PMU, HCWW, and WSCs (with a focus on those located in the World Bank investment program area).

6. *The support provided by WSP will aim to strengthen effective country systems for learning and knowledge sharing among rural sanitation stakeholders.* The sector coordination platform will be a strong tool for enabling the sharing of knowledge, increasing sector evidence-based decision making, and reaching consensus in the sector. To this end, WSP will carry out the following outreach activities in addition to the TA and ESW: (i) conduct a workshop with all partners to develop a shared learning agenda and strategy, and conduct follow-on meetings; (ii) develop a Knowledge Management (KM) strategy and get buy-in; (iii) support local "learning" tours; (iv) strengthen the capacity of the Ministry and HCWW as knowledge-sharing organisms; and (v) organize "exposure tours" - both South-South and North-South - for key decision makers and people of influence to visit countries with similar challenges and history.

Main focus of Implementation Support

<i>Time</i>	<i>Focus</i>	<i>Skills Needed</i>	<i>Resource Estimate</i>	<i>Partner Role</i>
<i>First twelve months</i>	Design of performance assessment systems, as well as design of 5-year plans and annual investment plans, including considerations of long-term sustainability; development of capacity building plans; establishment of arrangements for independent verification; strengthening of the M&E system	Legal; governance; procurement; financial management; social (gender and ethnic minority) and environment; sanitation systems specialist; hygiene promotion; M&E;	3 implementation support missions plus 3 technical missions 3 x 10 people x 1.5 weeks = 45 weeks Plus 3 x 5 people x 1 week = 15 weeks <u>Total 60 person weeks over 12 months</u>	Joint missions with WSP team
<i>12-60 months</i>	Reviewing implementation progress, cross-checking linkages between WSC planning and results, providing support in case of disputes relating to verification (MHUUC-HCWW-WSC or between GoE and IVA)	Legal; fiduciary; social (gender and ethnic minority) and environment; sanitation systems specialist; hygiene promotion; M&E; economics and finance	2 implementation support missions per year plus midterm review 2 x 4 yrs x 8 people x 2 weeks = 128 weeks 2 x 12 people x 2 weeks = 48 weeks	

			<u>Total 176 weeks over 48 months</u>	
<i>Other</i>	Independent audit/ assessment of verification of results	Independent technical expertise	3 people for 6 weeks <u>Total 18 weeks</u>	

Task Team Skills Mix Requirements for Implementation Support (entire Program life)

<i>Skills Needed</i>	<i>Number of Staff Weeks</i>	<i>Number of Trips</i>	<i>Comments</i>
<i>Legal</i>	10	<i>n/a</i>	
<i>Procurement</i>	25	5	
<i>Financial Management</i>	25	2	
<i>Governance</i>	25	5	
<i>Social– EM/Gender</i>	25	5	
<i>Environment</i>	25	5	
<i>M&E</i>	25	10	
<i>Technical</i>	50	16	
<i>Economics and finance</i>	10	3	

Role of Partners in Program implementation

<i>Name</i>	<i>Institution/Country</i>	<i>Role</i>
WSP		Strengthen the capacity and autonomy of national and local public service providers to deliver sustainable rural sanitation services especially to the poor through specific Technical Assistance (TA) and Economic Sector Work (ESW) provided to the PMU, HCWW and WSCs (with a focus on those located in the World Bank investment program area).

IWSP	KfW (Lead Donor) for a consortium of donors	The Program will benefit from the technical assistance provided to support the project in two overlapping WSCs in the areas of improving capital investment planning, project implementation, and quality assurance
Water Sector Reform Program WSRP – Phase II	EU	This EU-funded program is providing budget support to the sector on both the National and WSC level. The NRSP will have synergies with WSRP on-going activities to help the WSCs as well as the work done on the National level.

Annex 10 : MAP SECTION

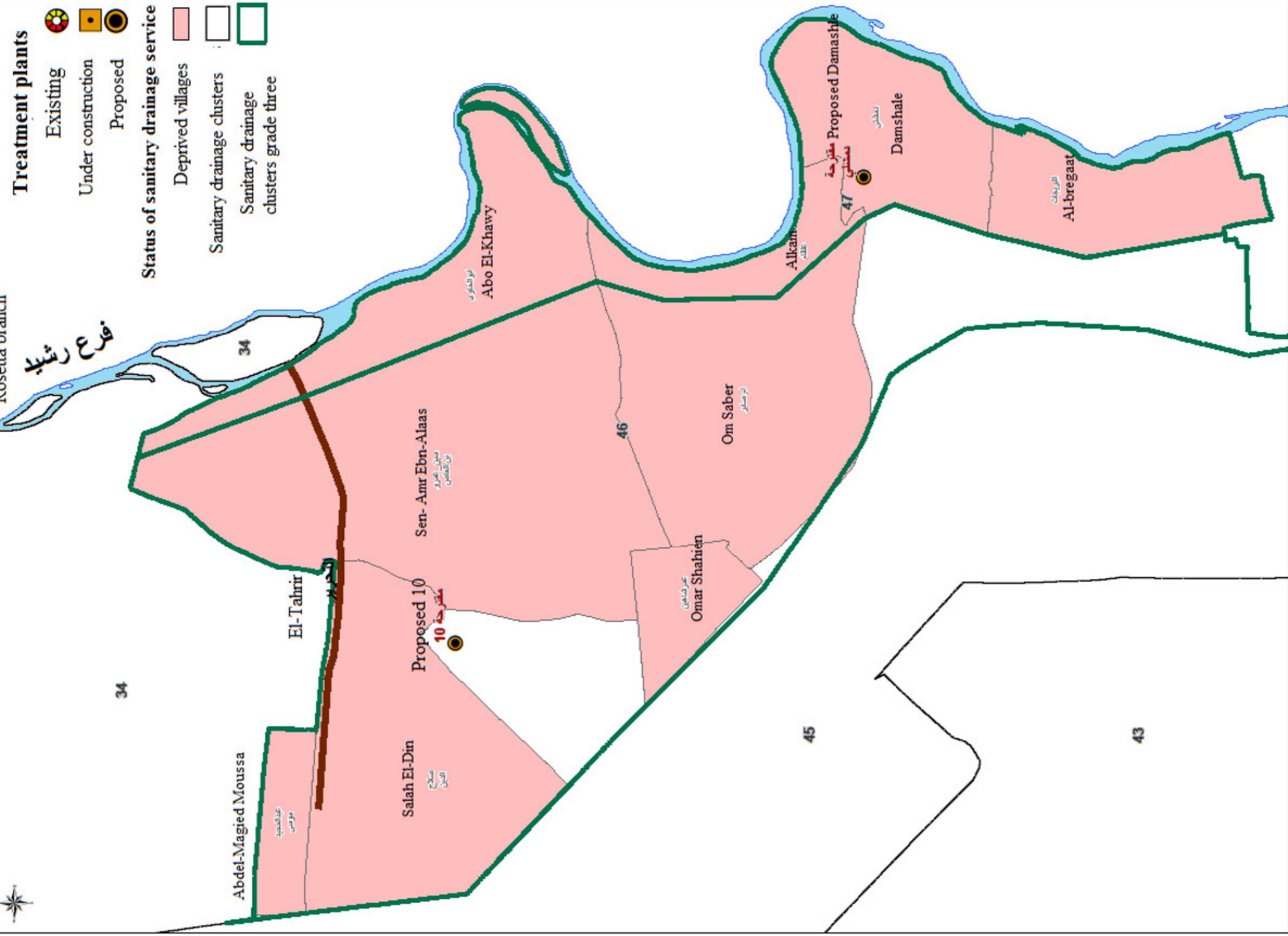


Treatment plants

- Existing 
- Under construction 
- Proposed 

Status of sanitary drainage service

- Deprived villages 
- Sanitary drainage clusters 
- Sanitary drainage clusters grade three 



34

Abdel-Magied Mousa

El-Tahrir

Salah El-Din

Proposed 10

Sen-Amr Ebn-Alaas

Abo El-Khawvy

46

Om Saber

Omar Shahren

45

Alkhan

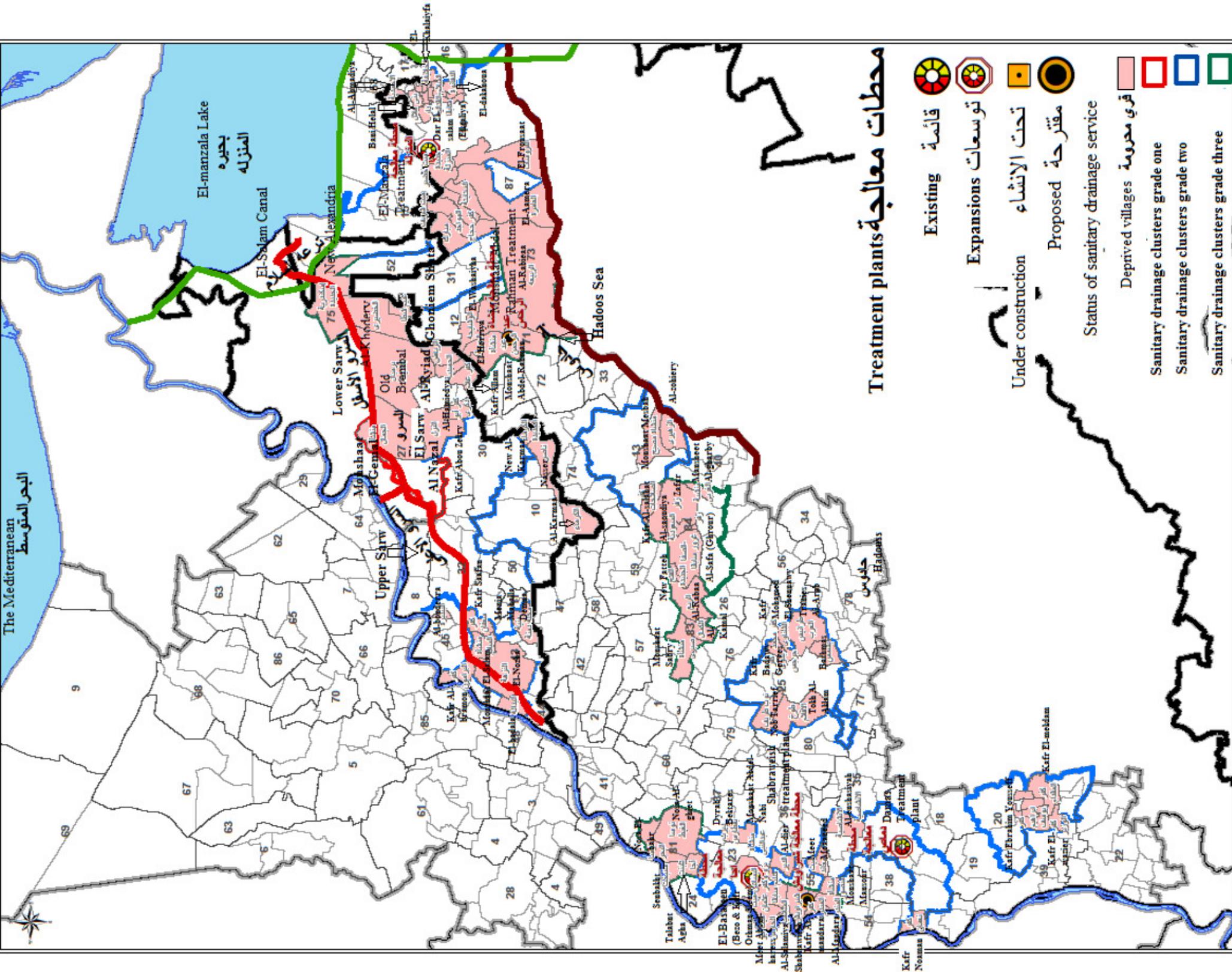
Proposed Damashle

Damshale

43

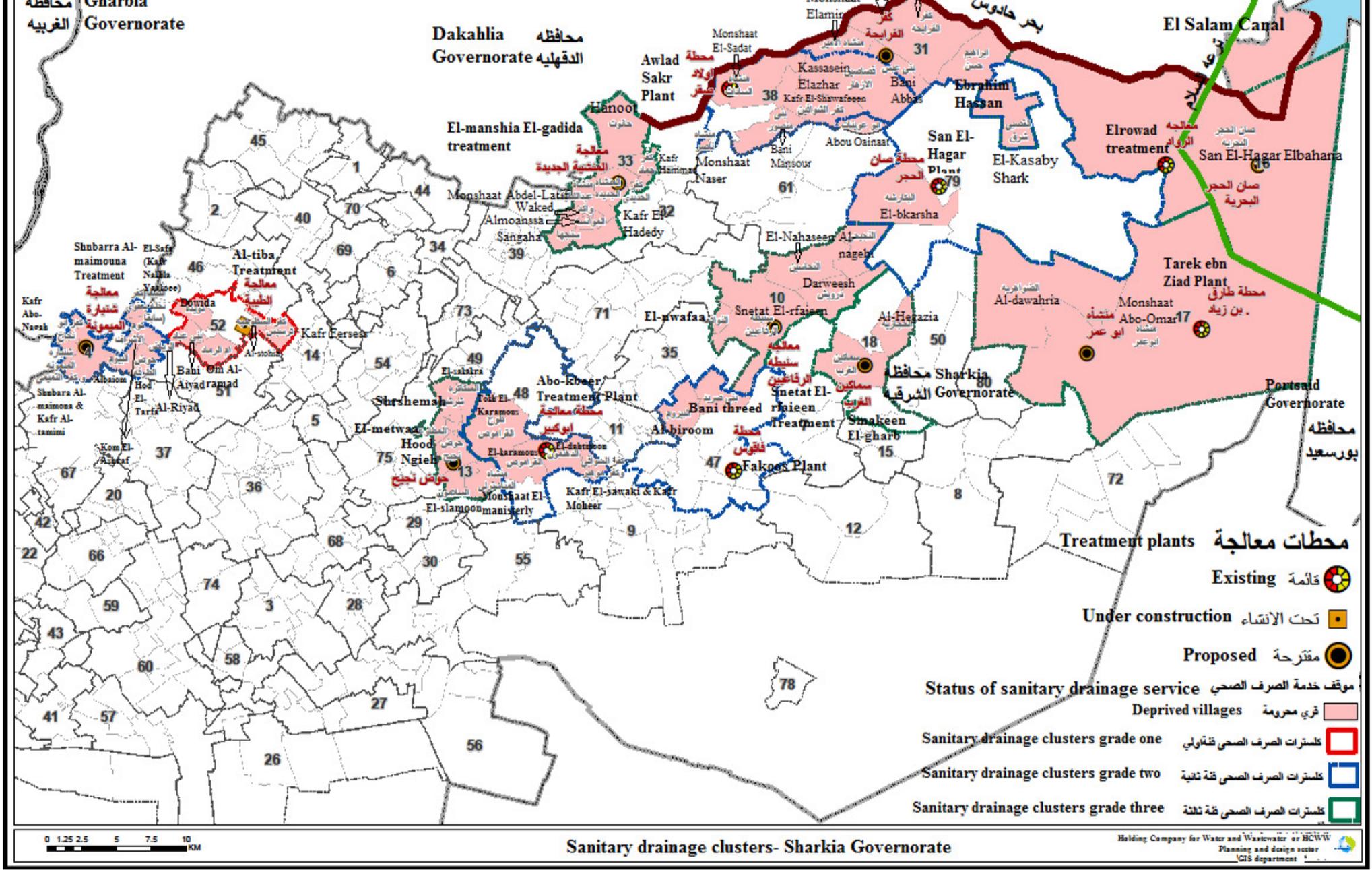
Al-bregaat

فرع رشيد



محطات معالجة مياه الصرف الصحي

-  قائمة Existing
-  توسعات Expansions
-  تحت الإنشاء Under construction
-  مقترحة Proposed
-  قري محرومة Deprived villages
-  Sanitary drainage clusters grade one
-  Sanitary drainage clusters grade two
-  Sanitary drainage clusters grade three



Dakahlia محافظة
Governorate الدقهلية

El Salam Canal

Awlad Sakr Plant

El-manshia El-gadida treatment

Elrowad treatment

San El-Hagar Elbaharia

Shubarra Al-maimouna Treatment

Al-tiba Treatment

Tarek ebn Ziad Plant

Abo-kbeer Treatment Plant

Bani threeed Treatment

Sharkia Governorate

Port Said Governorate

Treatment plants محطات معالجة

Existing قائمة

Under construction تحت الإنشاء

Proposed مقترحة

Status of sanitary drainage service موقف خدمة الصرف الصحي

Deprived villages قري محرومة

Sanitary drainage clusters grade one مستويات الصرف الصحي قناتولي

Sanitary drainage clusters grade two مستويات الصرف الصحي قناتولي

Sanitary drainage clusters grade three مستويات الصرف الصحي قناتولي

Sanitary drainage clusters- Sharkia Governorate