

UNITED NATIONS DEVELOPMENT PROGRAMME

**PROJECT DOCUMENT**

Proposal ID: 47529  
**Number:** PAL50-00047396  
**Title:** Construction of Sewage Treatment Plant and Main Pressure Line in Khan Younis  
**Duration:** 24 months  
**Project site:** Southern Gaza Strip ( Khan Younis Governorate)  
 0400 Natural Resources  
**ACC/UNDP sector & subsector:** 1520 Employment Generation & 1230 Urban Development  
**Executing Agency:** UNDP/PAPP  
**Estimated Starting Date:** August 2005

**UNDP cost sharing financing**

**Trust Funds:**

**The Government of Japan:**

US\$ 14,830,000

Programmable Amount	USD 13,731,481
UNDP Support Cost	USD 1,098,519
<b>Total</b>	<b>USD 14,830,000</b>

*The project aims at improving the environmental health conditions in the area of Khan Younis through the provision of a comprehensive sewage network that will include the construction of a treatment plant and sewage lines. The project will support the development of detailed designs for the treatment plant and the complementary parts of the sewage network, and the construction works of both the treatment plant and part of the sewage lines. The second aim of the project is to create through the adoption of labour intensive methods techniques where applicable in the implementation of the project activities the maximum number feasible for short term and long term employment opportunities.*

<b>On Behalf of the</b> United Nations Development Programme	<b>Signature</b>	<b>Date</b>	<b>Name/Title</b> Timothy S. Rothermel Special Representative
--	------------------	-------------	---

UN official exchange rate at the date of signing of Project Document: US\$ 1 = NIS 4.52

## **TABLE OF CONTENTS**

<b>A. DEVELOPMENT CONTEXT .....</b>	<b>3</b>
A1 Overall Situation and Geographical Location .....	4
A2 Description of the sub-sectors .....	6
A3 Host Country Strategy .....	7
A4 Institutional framework .....	8
<b>B. PROJECT JUSTIFICATION .....</b>	<b>8</b>
B1 Problem to be addressed: The Present Situation.....	8
B2 Programme/Project Description and Expected End of Project Situation .....	9
B3 Programme/ Project Beneficiaries .....	10
B4 Project Strategy and Sustainability .....	10
B5 Implementation Arrangements .....	11
B6 Reasons for Assistance from the UNDP .....	14
B7 Special Considerations.....	14
B8 Coordination Arrangements.....	14
B9 Counterpart Support Strategy .....	14
<b>C. DEVELOPMENT OBJECTIVE.....</b>	<b>15</b>
<b>D. IMMEDIATE OBJECTIVES, OUTPUTS, AND ACTIVITIES .....</b>	<b>15</b>
<b>E. RISKS .....</b>	<b>18</b>
<b>F. PRIOR OBLIGATIONS .....</b>	<b>18</b>
<b>G. PROJECT REVIEW, REPORTING AND EVALUATION.....</b>	<b>18</b>
<b>H. BUDGET .....</b>	<b>19</b>

## A. DEVELOPMENT CONTEXT

### Current Situation

The Japan International cooperation Agency (JICA) had shown a great interest to solve the environmental and sanitary problem in the central part of Khan Younis through the implementation of the sewage collection system and treatment plant for that area. The Japanese Government had planned to implement the project bilaterally at a cost of US \$ 40 million. The current turmoil in the area caused by the continuous invasions to the Palestinian areas by Israel represented a major obstacle regarding the implementation of the project bilaterally. The residents of Khan Younis are still suffering due to the absence of a functional wastewater system in their town, which causes serious environmental and health problems. This is due to the fact that the ground water aquifer at the area being shallow cause fast and serious infiltration of the sewage and waste water into this aquifer due to using cesspits and septic tanks, which results in sever water born and other diseases affecting the entire living well-being of the Khan Younis town population.

Under this situation, the Municipality of Khan Younis in cooperation with the Palestinian Water Authority (PWA) decided to pursue the project through UNDP. And at the same time raise funding and implementing the affordable in terms of funding and doable in terms of implementation parts of the waste water system in the town.

These parts of Khan Younis Waste Water Project that are being currently implemented or committed by the donor community, to date July 2005, are the following:

- 1- The construction of steel pressure line or conveyance line, 16 inch diameter, 2000 m length from PS3 to the highest topographic point at Ma'an area, Ma'an energy breaker manhole. The project is divided into two components. The first component is the construction of 800 meter part of the line financed by the Governments of Norway and the Netherlands and implemented through PEC DAR with total budget of US\$ 65,736, and the second component consists of the construction of 1,300 meters and is funded by UNDP and implemented by the JCP with total budget of US\$ 120,000. The components works were completed in August 2003 and October 2005 respectively.
- 2- The construction of the pumping station PS2 and its steel pressure line of 20 inch diameter, 1700 meter length; in addition to constructing and completing the remaining segment of the 16 inch pressure line, 500m length. These steel pressure lines, 16 inch and 20 inch are convening the waste water from PS3 and PS2 to Ma'an energy breaker manhole. The project is funded by the USAID through UNRWA with total budget of US\$ 1,094,000. All project's works were completed in March 2005.
- 3- The construction of the main gravity collection UPVC pipes that serves the catchments areas of pumping station PS2, the city

centre zone I, and the south and west zone of the refugee camp, of 20 km length. The project is funded by the USAID through UNRWA with total budget of US\$ 1,217,000. All works of the project were completed in March 2005.

- 4- The construction of the main gravity conveyance concrete pipelines from Ma'an Energy breaker Manhole towards pumping station PS3, of diameters of 800mm and 1000mm and of total length of 2,160m. The project cost is US\$ 500,000 funded by the Islamic Development Bank through UNDP/PAPP, and all of its works were completed in October 2004.
- 5- The construction of pumping station PS1 and its conveyance pressure steel pipeline, PS3 will serve the catchments areas of the city center zone II & III, the north zone of the refugee camp and Al Amal zone. The project is committed to be funded by the EU through the EMSP with total budget of US\$ 600,000. The project is ongoing and 60 percent of its works have been completed.
- 6- The construction of pumping station PS8. The project is financed by the Palestinian Ministry of Finance and Khan Younis Municipality with a total budget of US\$ 900,000. The project is currently under implementation that started in March 2005.
- 7- The construction of gravity sewer UPVC pipelines at sheikh Nasser area, of 8&10 inch and of total length of 2 km. The project budget is US\$ 120,000 funded by the Norwegian and the Netherlands Governments, and all of its works are completed.

#### **A1 Overall Situation and Geographical Location**

The programme described in this document is focusing on two sectors namely (a) the infrastructure sector which has a direct and immediate bearing on the quality of the environment in the place where the majority of Khan Younis residents live and work; and (b) on the labour sector, specifically those numbers of Gaza labour force who are presently unemployed. Pressing needs in both of these sectors are to be addressed simultaneously through a large scale programme of infrastructure improvement projects that will be carried out to the maximum extent possible by labour intensive methods.

The current situation is widely characterized by the Palestinian Intifada, which broke out at the end of September 2000. The Israeli measures imposed on the Palestinian Territories in the wake of the Intifada have had a devastating effect on the Palestinian economy and overall living situation.

The most significant Israeli measure is the closure policy, which cuts off the West Bank and Gaza Strip from Israel and East Jerusalem, the West Bank from the Gaza Strip, as well as towns and villages within the Palestinian territories from each other. Economic activity within the Palestinian territories has thus been seriously disrupted in all sectors. The results can be summarized as follows<sup>1</sup>:

1. A rise in the rate of unemployment to above 50% (or 370,000 workers in the West Bank and Gaza Strip) compared to 11% (71,000 persons) during the first nine months of 2000;
2. A rise in the poverty rate - defined as consumption of less than \$ 2.10 per day/per person) – above 60% versus about 21% projected before the closures (a rise by almost 300%); the economically deprived Gaza Strip is especially affected by the rise in poverty. Poverty levels in the Gaza Strip are above 70%;
3. Approximately 42% of Gazans are entirely dependent on food aid and nearly 70% have reduced the quality of food they consume. Studies show that currently above 13% of children in Gaza exhibit moderate to severe acute malnutrition and 18% exhibit chronic malnourishment.
4. On average, a “normal” closure day is estimated to cost the local economy about US\$ 7 million. Annual losses are therefore about 50% of the pre-Intifada GDP. However, currently even these estimations seem conservative; GNP losses are significantly higher due to the loss of employment opportunities in Israel (approximately 100,000 workers are unable to reach workplaces in Israel);
5. Near bankruptcy of the Palestinian Authority and possible collapse of municipal services, as a result of closures and other punitive measures imposed by the IDF (among them the refusal to transfer taxes collected on behalf of the PA);

Equally, if not more damaging in the longer term is the severe psychological and social damage inflicted on the Palestinian people, particularly on children, youth and on family life in general. The site of this project is KhanYounis city, the second largest city of the Gaza Governorate following Gaza City. It is located in the southern part of the Gaza Strip, and expected to be a development centre for the southern parts of the Gaza Strip according to the Palestinian Regional Plan for the Gaza Strip. It has at present administrative area of about 52 km<sup>2</sup> with a total population of approximately 175,000.

---

<sup>1</sup> Source: *The Impact of the Closure and other Mobility Restrictions on Palestinian Productive Activities, 1 January 2002 – 30 June 2002*; UNSCO

The UNSCO report summarizes the impact of the Israeli closure policies on the Palestinian economy. Due to the prolonged and tightened measures it can fairly be assumed, that the state of the Palestinian economy has deteriorated further since.

Occupied by Israel in 1967, approximately 60% of the Gaza Strip was handed over to Palestinian self-rule in 1994 following the signing of the Oslo Accords. The remaining 40% continue to be occupied by Israeli military facilities and approximately 6,000 settlers living in 16 settlements.<sup>2</sup>

The area covered by the proposed project is the Governorate of Khan Younis in the southern part of the Gaza Strip. The city of Khan Younis where the majority of the population are residing currently has 175,000 residents, with approximately 60,000 refugees living in the area refugee camps. The southern part of the Gaza Strip was economically weak even before the current Intifada and unemployment was high in the area.

The Project's main objective is to improve the environmental and health conditions in Khan Younis. The second main objective of the assistance would be to provide employment to the maximum possible number of the unemployed workers, and to enable them to secure the minimum level of survival requirements for their families.

## **A2 Description of the sub-sectors**

The project described in this document focuses on two sectors namely the infrastructure sector, and specifically on the creation of a suitable public infrastructure facilities namely a sewage network and treatment plant in the town of Khan Younis, and the labour sector, specifically those members of the labour force of the southern Gaza Strip who are presently unemployed and. Pressing needs in both these sectors are to be addressed simultaneously through the proposed project.

### **(a) The Infrastructure Sector**

As in Palestinian cities in the West Bank and Gaza Strip, municipal infrastructure in Khan Younis town has deteriorated during the period of Israeli occupation due to disinterest and neglect by the Israeli Civil Administration and lack of local municipal resources to provide for adequate maintenance. All sub-sectors have been affected, roads and streets: public buildings, including markets, schools, hospitals and clinics; water and sanitation facilities and housing; all are in need of repair, rehabilitation and expansion. Some major and critical infrastructure facilities have not yet been put in place such as the Khan Younis wastewater network and treatment plant. In the meantime, the population of the Gaza Strip has roughly tripled over the past 27 years and continues to grow at an estimated rate slightly above 4% per year creating severe strains on existing infrastructure.

The result has been the steady spread of near-slum conditions in the over-crowded towns and camps and serious pollution and environmental degradation, aggravated by the decline in municipal services including such basic services as road extension and rehabilitation, provision of sewage networks, trash collection and garbage disposal.

---

<sup>2</sup> Source: Passia Calendar, 2001

## (b) The Employment Situation

The labour force in the Gaza Strip is estimated to number between 200,000 and 220,000.<sup>3</sup> Due to the inability of the local economy to generate a sufficient number of jobs, the area (like the West Bank as well) has served to a large extent as a "labour reserve" for Israel, and to a lesser extent for neighbouring Gulf States. Employment in Israel has been regulated and rationed through a system of work permits and has been subject to numerous security restrictions and frequent border closures, causing wide fluctuations in the days actually worked in any given year.

Since the start of the Al-Aqsa Intifada there have been several months of total closure, which prevented approximately 130,000 workers from the West Bank and Gaza Strip from reaching their jobs in Israel. The closure days during the recent Intifada have by many times outnumbered the days when small numbers of workers were allowed to cross into Israel. The internal closures, the frequent blockades on imports and exports, and the disruptions of free movement further cut Palestinian economic performance by half and contribute to catastrophic unemployment rates. As mentioned above approximately 370,000 Palestinian workers are currently unemployed. It is estimated that the unemployment figure for Gaza is around 50% of the labour force, while in the southern areas of the Strip it even exceeds 60%. Many others are under-employed in low-paying and low productivity jobs. Poverty, already widespread, has increased further. Currently the average employed Gazan worker has to support him/herself plus another 8 people.<sup>4</sup>

In many cases the prevailing situation is forcing families into severe poverty and malnutrition. Approximately 42% of Gazans are entirely dependent on food aid and nearly 70% have reduced the quality of food they consume. Studies show that currently above 13% of children in Gaza exhibit moderate to severe acute malnutrition and 18% exhibit chronic malnourishment.<sup>5</sup> These conditions further add to an already explosive situation in the region from the social, economic and political point of view.

To alleviate the extreme hardship of the Palestinian people through job creation is therefore currently the most pressing need.

### **A3 Host Country Strategy**

The PA's main and immediate objective is to assist to the maximum extent possible the Palestinian People in dealing with the effects of environment deterioration due to the increased number in the population that lacks appropriate systems to accommodate the produced waste and the lack of proper systems could be very hazardous. And the other objective is to assist in handling the harsh economic and social conditions they are presently subjected to.

---

<sup>3</sup> Source: Passia Calendar, 2001; UNSCO Report: *The Impact on the Palestinian Economy of Confrontations, Mobility Restrictions and Border Closures, 1 October 2000 – 31 January 2001*;

<sup>4</sup> Source: *The Impact of the Closure and other Mobility Restrictions on Palestinian Productive Activities, 1 January 2002 – 30 June 2002*; UNSCO;

<sup>5</sup> see above

## **A4 Institutional framework**

The PWA is the official regulating body and policy maker of the water sector. It is responsible for the overall short and long term planning at the water sector, and is coordinating the fundraising, prioritisation and coordinating the implementation of water and waste water projects in the Palestinian Areas. The PWA also is the key Palestinian negotiator with countries in the region regarding all water issues. It also has an additional important role represented in the responsibility of being the implementing agency for large scale water, storm water and waste water Projects in the West Bank and Gaza. The staff of the PWA has a long relevant experience in handling the water sector issues in the Palestinian areas including planning, prioritisation, drafting rules, regulations and policies of the water sector, data collection and management, negotiation and implementation of water projects. All of these characteristics of the PWA necessitate its involvement in the Khan Younis Waste Water Project not only in the capacity of a coordinating agency but also as source of expertise and knowledge that would be so important in deciding about the type of treatment, the consultants and contractors hiring and negotiations, etc. A project financed by the World Bank that has been under implementation for five years includes an integral component aiming at transforming parts of the PWA mandate into the Coastal Water Utility. An international bid has been awarded to an Austrian Consulting Firm to provide support and undertake the required steps towards the establishment of the Coastal Water Utility. That would be taking over the role of PWA in the fields of water, sewage and storm water networks and lines construction and overall monitoring and role of the municipalities in the field of tariff specification and collection.

Khan Younis Municipality has been the implementing agency for many projects executed by UNDP/PAPP and financed by the government of Japan in the fields of road construction and tiling, installation of water lines, storm water network and sewage lines and pumping stations, in addition to the construction of public buildings and other employment generation projects. The Municipality of Khan Younis is equipped with professional and well qualified staff distributed between the following departments:

- (a) Engineering or Technical Department (responsible for infrastructure).
- (b) Accounting and Finance.
- (c) General Administration.
- (d) Various sector departments such as health/environment, fire, etc.

The Engineering Technical Department commonly has separate sections responsible for design, water, sewage, electricity, roads and streets, etc. Departments tend to operate in a compartmentalized manner, reporting directly to the Mayor of the City.

## **B. PROJECT JUSTIFICATION**

### **B1 Problem to be addressed: The Present Situation**

Despite its big size as the second city in Gaza Strip, Khan Younis city and the surrounding villages are still suffering from the lack of conventional wastewater collection system.

The sources contributing to the wastewater are primarily households, since little industry exists. The residents in Khan Younis depend on the cesspits for wastewater disposal. It is the only technique in the city and its camp. More than 25,000 units (cesspits) exist in Khan Younis according to the municipality estimates. Open drainage systems are common in refugee camps. Overall, the prevalence of open raw sewage has a negative health impact on the residents, their children, and the recreational coastal users. Also, most of the Khan Younis wastewater, which collected, is disposed off finally to Wastewater Lagoons located in the Eastern Area. Wastewater is disposed off without any treatment and lagoons are not protected with any lining layers. This contributes to several health and environmental impacts.

Moreover, the current sanitation system does not only impact the health and environmental conditions in Khan Younis, but it imposes substantial economical load on the residents as well as the Municipality. The average cost that each household incurs to dispose off the wastewater from their cesspit is 200NIS a month. On the other hand and due to the prevailing economical situation in Gaza strip, Municipality of Khan Younis decreases the collected fees for evacuating the cesspits to a level that does not recover the cost. The fee collected by the private sector is 50NIS per truck, where as the Municipality fee is 20NIS per truck.

In addition to its negative impact on the ground water that results from the infiltration of raw sewage to the underground water, the poor sanitation system is the primary cause of the infectious diseases.

Pathogenic bacteria, parasites, and viruses currently pose a major health problem for the Area. The health status of the residents of refugee camps and municipalities indicates strongly that the environment remains a source of disease.

The poor wastewater collection, conveyance, and storage has led to increased health risks associated with mosquitoes, large flies, rats, and other vectors. Stagnant pools of wastewater enhance mosquito breeding and large fly populations.

Associated diseases with the inadequate of environmentally sound disposal of sewage have resulted in epidemics and infectious diseases associated with the mismanagement of water pollution like cholera, dysentery, and gardiaes and associated with the wastewater like hepatitis and yellow fever.

## **B2 Project Description and Expected End of Project Situation**

In principle, all the proposed activities are planned to be implemented within 24 months from the date of signing the agreement between UNDP/PAPP and Khan Younis Municipality. The period of the project implementation will include the review and finalization of designs and project documents, the bidding process, bids evaluation and awarding to the consultant, design phase, pre-qualification of contractors for the construction works, bidding process, bid evaluation and awarding contracts to the contractors, and finally the implementation phase that is expected to last for 20 months.

The Municipality of Khan Younis will facilitate the implementation of the project through the provision of all the required legal and procedural requirements, solving land acquisition disputes, in addition to maximize the residents support and participation in the project implementation, beside being part of the evaluation review of bids, providing technical support when needed, etc. The PWA will be acting as a coordinating body of the project providing its technical assistance to the project implementation and assist in the tendering process of the Project.

### **B3 Programme/ Project Beneficiaries**

The primary beneficiaries of the project will be the 150,000 residents of Khan Younis and in a future stage the residents of the villages located in Khan Younis Governorate.

Other beneficiaries include:

- Owners of property in the flood prone areas who will no longer suffer flood caused drainage.
- The families of the unemployed workers who will have their living sustained due to the income, although minimal, to be generated by their household heads.
- The Khan Younis municipality and Palestinian Authority as the project contribute to preventing a total collapse of the institutional, social and economic fabric in the Gaza Strip in general and Khan Younis town in particular.

### **B4 Project Strategy and Sustainability**

#### **B4.1 Overall Strategy**

The overall strategy of the project is to design the treatment plant through identification of international consultant that could use local consultant as needed in the design stage, implementation of the collection system and treatment plant in conjunction with what is under implementation of pumping stations and conveyance gravity and pressure pipes as a complete system.

#### **B4.2 Project Sustainability**

The Project sustainability could be ensured through the completion of all phases for having a fully functional sewage treatment plant and sewage collection lines and systems. The Municipality of Khan Younis will be responsible for the operation and maintenance of the treatment plant, pumping stations and network.

Khan Younis Municipality will provide training programmes for the concerned municipal staff in the technical areas pertaining to the operation and maintenance of the treatment plant and the sewage network. The Municipality would be undertaking community awareness activities which would maximize the level of community ownership of the project. All the equipments and tools deemed essential for the treatment plant and the system operation and maintenance would be made available

by either the Municipality of Khan Younis or through assistance from the PWA (or Coastal Water Utility) or UNDP/PAPP. All of these factors would contribute to the project sustainability in terms of physical outputs of the project. The socio-economic impacts of the project are on the other hand expected to be sustainable. The potential of water born diseases would be minimized; the quality of the ground water aquifer would be maintained as no further pollution to the aquifer as a result of the overuse of the cesspits and septic tanks would occur. In addition, the overall environmental and health conditions would be improved. This has important economic/financial impact on both the people and government as their expenses on the medical services would be decreased to a large extent. This would allow investing in other priorities such housing and education, which would contribute to diversify the process of improving the overall social and economic conditions in the Gaza Strip.

### **B5 Implementation Arrangements**

The overall execution of the programme will be undertaken by the UNDP/PAPP. That will entail the following responsibilities:

- The UNDP/PAPP will utilise its large expertise in various fields: Engineering Unit, technical advisors, project staff, procurement specialists, etc to ensure the optimal implementation of the project various components. The UNDP/PAPP will consult directly with the responsible bodies, with the targeted communities representatives and with the PWA and Municipality of Khan Younis;
- In its capacity as Executing Agency, UNDP/PAPP will be accountable to the donor of the funds contributed.
- A Memorandum of Understandings (MOU) will be drafted between the UNDP/PAPP and the Municipality of Khan Younis. The MOU will outline the responsibility of each party and will ensure the project's components are implemented in the most effective, transparent and accountable way.
- UNDP/PAPP will also provide all the technical assistance and managerial support needed by the implementing institution;
- It will be following up on projects implementation, providing overall supervision of implemented activities;
- Assign a project engineer and a programme assistant to follow up on the implementation of the various activities of the project;
- UNDP/PAPP will provide the donors with progress and financial reports as well as audit reports;
- Visibility of the donor country will be ensured to the maximum extent possible;
- Due to the urgency of the situation, the UNDP/PAPP will ensure fast implementation of activities.

The UNDP/PAPP as the Executing Agency would be undertaking *inter alia* the above listed responsibilities, while the PWA and Municipality of Khan Younis will serve as the coordinating bodies. The main responsibilities of UNDP will include the following between the parties will be in accordance with the following:

- Have overall financial responsibility of the project and be accountable to the donor for the funds contributed.
- Recruit technical staff to perform on-site daily supervision of construction activities.
- Solicit bids, select contractors, enter into contracts with them, and disburse payments to Contractors according to UNDP rules and regulations.
- Develop an implementation plan for project activities, and set clear and transparent procedures for operations.
- Day-to-day project implementation and supervision of all [project activities.
- Transfer funds the selected contractor according to approved submittals and in accordance with its rules and regulations.
- Arrange for auditing of project accounts; prepare periodic progress and financial reports on project implementation.
- Verify technical quality and cost-effectiveness of works undertaken, and certify the satisfactory completion of the project activities.
- Submit period financial and progress report to donor.

There are two scenarios for the project implementation were discussed between Khan Younis Municipality, PWA and UNDP/PAPP. The two scenarios are summarized below and the second scenario has been agreed upon by the three parties to be adopted for the project implementation.

#### **Scenario 1:**

1. An International consultant should do the conceptual design of the WWTP.
2. An International contractor supported by local contractors should do the detailed design based on the modality of “ turn key contract ”, Design and build.
3. Construction management could be done by local consultant supported by international expertise mainly in the fields of treatment process engineering, hydraulics engineering and /or electromechanical engineering.

#### **Scenario 2:**

1. An International consultant jointly with a local consultant should make a detailed design and provide complete tender documents for the construction phase.
2. Local contractor supported by international expertise's or local contractor with a joint venture with international contractor could execute the construction of the treatment plant.

3. Construction management could be done by local consultant supported by international expertise mainly in the fields of treatment process engineering, hydraulics engineering and /or electromechanical engineering.

This Scenario has been chosen for the project implementation due to the following facts:

1. The local experience in formulating high quality detailed design of a WWTP with professional liability is limited.
2. The cost of "turn key contract" by using international contractor, as suggested by scenario 1, will be higher than using local contractors supported by international expertise's, as suggested by scenario 2.
3. Employing Local contractors supported by international expertise, as suggested by scenario 2, at the implementation phase, will avoid any delays of the project activities, due to political constrains.
4. Employing local contractors supported by international expertise, as suggested by scenario 2, will facilitate more job opportunities for local professionals and workers.
5. Employing local contractors with international expertise's and also, employing local consultant with international expertise's, for both the construction phase and the construction management activities, will enhance the process of experience and technology exchange and will create a local professional team familiar with the new system and the executed technology.

## **B6 Reasons for Assistance from the UNDP**

UNDP/PAPP will provide assistance for this Project for the following reasons:

1. The Project has a direct bearing on major objectives of UNDP/PAPP, it will assist in the environmental, social and economic development of the Palestinian people and it will have an impact on both health and poverty and social welfare through its environmental health improvement and employment generation strategy;
2. UNDP/PAPP has played a key role in the field of environmental intervention and job creation during the previous years of imposed closures that also lead to sharp increases in unemployment rate, which has rendered it one of the most credible organisations working in this field;
3. The UNDP/PAPP managerial, financial and technical staff has gained a considerable level of experience in managing infrastructure and employment generation projects.
4. UNDP has worked for over twenty five years in different projects mainly water supply and sanitation.

## **B7 Special Considerations**

The ongoing projects representing different components of the wastewater system and financed by several donors should be considered and well coordinated with the project various components. Any contradiction on site and possible duplication would lead to a delay in the implementation of the project. Additionally, the restrictions on importing construction materials should be highly considered as a critical factor affecting the progress of the construction works. Joint venture between local and international contractors should be considered while tendering the treatment plant. This is due to the lack of experience of the local contractors in implementing such a large scale project and the high cost of the international contractors if they are to do the job without local contractors.

## **B8 Coordination Arrangements**

The project will include extensive organization and full utilization of time and funds available. So a steering committee will be formulated that will include all parties at hand: UNDP, PWA, and the Municipality of Khan Younis.

## **B9 Counterpart Support Strategy**

The necessary technical and managerial support capacity of the counterpart exists in the form of experienced staff and project implementation arrangements, including the close contacts that the Municipality of Khan Younis and PWA have developed with municipalities and PA ministries over the past several years since both agencies implemented many projects in the field of water and sanitation. The gained experience will be made available for the accurate and speedy implementation of the project. UNDP is available to enhance and complement deficits in this field.

### C. DEVELOPMENT OBJECTIVE

The Programme development objective is to improve environmental and health conditions in Khan Younis for the purpose of enhancing residents' quality of life and stimulating investment and economic development and creating the maximum number of job opportunities for unemployed Palestinian workers in the process of treatment plant construction.

### D. IMMEDIATE OBJECTIVES, OUTPUTS, AND ACTIVITIES

Immediate objective 1:

To construct treatment plant and the remaining parts of the sewage system as per design

Outputs	Activities	Responsible Party
1.1 Construction contract negotiated	1.1.1 Identify construction firms through a pre-qualification process	UNDP in cooperation with Municipality of Khan Younis and PWA
	2.1.2 Review and evaluate bid	UNDP in cooperation with Municipality of Khan Younis and PWA
	2.1.3 Finalize contract	UNDP in cooperation with Municipality of Khan Younis and PWA
2.2 construction phase	2.2.1 Procure material, recruit workers and implement work	Contractor under the supervision of UNDP

Outputs	Activities	Responsible Party
	2.2.2 Disburse funds against work	UNDP
	2.2.3 Manage and supervise the project activities	UNDP
2.3 Completion report	2.3.1 Carry out final inspection report	UNDP in cooperation with Khan Younis Municipality and PWA
2.4 Final audit and final project report	2.4.1 Carry out final financial audit and finalize report	UNDP

## **E. INPUTS**

### **1. The Government of Japan**

The Government of Japan will transfer to the UNDP/PAPP account the total amount of US\$ 14,830,000 as an emergency contribution to be utilised in covering the cost of the project described in this document including the UNDP/PAPP General Management Cost (GMC).

### **2. UNDP/PAPP**

1. Day-to-day project management and coordination.
2. Supervise the process of preparing the required designs and tender documents in coordination with Khan Younis Municipality and PWA technical staff.
3. Development of an implementation plan for various project activities.
4. Identifying a short list of eligible contractors through a competitive tendering and bidding process, select contractors and enter into contracts with them.
5. Recruit technical staff to perform on-site daily supervision of construction activities, assign tasks and maintain payroll records.
6. Verify the technical quality and cost-effectiveness of works undertaken.

### **3. The Municipality of Khan Younis and PWA**

1. Assistance in identifying contractors and screening contractors to ensure that they conform with established project criteria and the employment objectives of the project.
2. Procurement services, including purchase, importation and delivery of any equipment, tools and materials that are needed.
3. Provide logistical support.
4. Participate in the Project Steering Committee that would be formed to overall monitor and facilitate the project implementation.
5. Provide technical assistance to the project, and increase public awareness and participation.

## **F. RISKS**

Implementation of the planned project could be delayed seriously by the present and future border closures preventing the importation of needed construction materials into the Gaza Strip from Israel. Such closures during the recent months have had a substantial negative impact on the ongoing infrastructure projects.

However, this risk applies for all projects in the Gaza Strip and cannot be avoided.

## **G. PRIOR OBLIGATIONS**

The Palestinian Authority has already allocated the needed land for the treatment plant.

## **H. PROJECT REVIEW, REPORTING AND EVALUATION**

### **1. Reporting**

UNDP/PAPP will:

- prepare quarterly financial and operational progress reports to be submitted to the Donor.
- prepare any additional report, as requested by the Donor.
- prepare a comprehensive terminal report no later than three months after project completion.

### **2. Review and Evaluation**

- (a) The project will be subject to joint review by representatives of the Khan Younis Municipality, PWA and UNDP/PAPP in the Steering Committee at least once every 2 months. The first such meeting will be held within 1 month of the start of full implementation.
- (b) A project terminal report will be prepared for consideration at the terminal joint review meeting. It shall be prepared in draft sufficiently in advance to allow review and technical clearance by the executing agency at least four months prior to the terminal review.

The project shall be subject to evaluation upon completion. The organization, terms of reference and timing will be decided after consultation between the parties.

## H. BUDGET

The initial project cost was identified of US \$ 15,000,000 detailed in the following table:

Description	Budgeted Cost US \$
Treatment Plant Construction (see Annex 1)	12,550,000
Supply and Install of 24 inch diameter and 4,750 meter length Steel Pressure Line from pump station No. 8 tow WWTP (see Annex II: the Maps) Construction of the main pressure line	1,000,000
Project Engineer for 24 months	60,000
Civil Site Engineers 2 for 20 months	60,000
Electromechanical Mechanical 1 for 20 months	30,000
Sub-total	13,700,000
Contingencies	31,481
<b><i>Subtotal</i></b>	<b><i>13,731,481</i></b>
Administrative and Operational Support at 8% flat rate	1,098,519
<b>Total Estimated Budget (US \$)</b>	<b>14,380,000</b>

modified  
12.11

**Annex I. Breakdown of the Treatment Plant Construction Cost**

<b>Item</b>	<b>Description</b>	<b>Cost Estimate in US\$</b>
1.	Civil Works including (Excavation, concrete constructions, landscaping, Infrastructures, infiltration basins, etc.)	8000,000
2.	Mechanical and Electromechanical works including (blowers, digesters, scrapers, grit equipments, generators, compressors, pumps instrumentation, etc...)	4000,000
3.	Automation and control systems	550,000
	<b>Total (WWTP)</b>	<b>12,550,000</b>