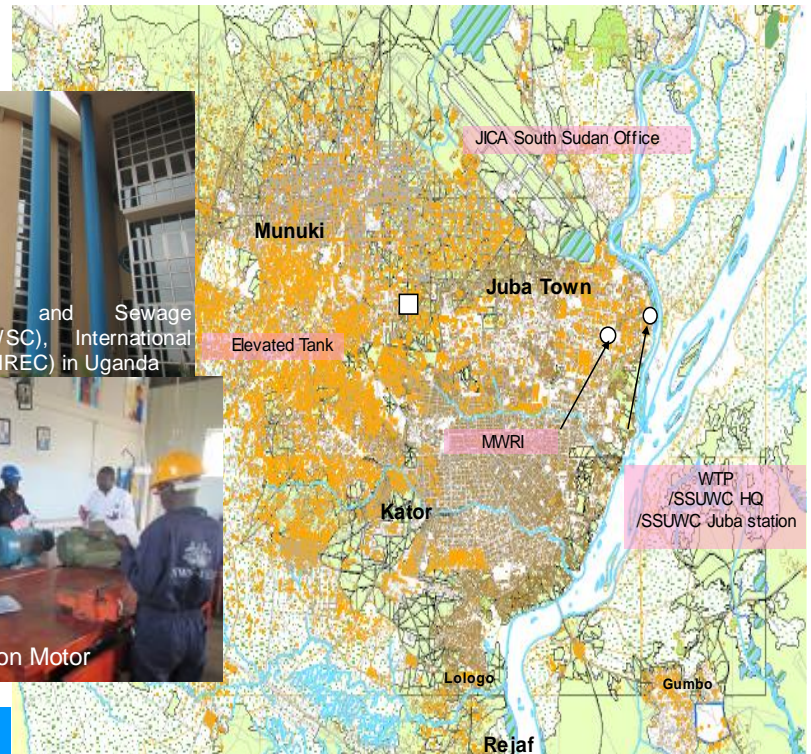


Project for Management Capacity Enhancement of South Sudan Urban Water Corporation Phase2



South Sudan, Juba City



1. Background of the Project

The Republic of South Sudan became independent in July, 2011 through Comprehensive Peace Agreement (CPA) in January, 2005. The population of Juba, capital of South Sudan, increased rapidly due to returnees from other areas in South Sudan and outside countries. The population is estimated as 600,000-800,000 as of 2011. The infrastructure in Juba has been damaged because of its aging and inappropriate operation and maintenance owing to the long conflict.

Juba Station of South Sudan Urban Water Corporation South Sudan (SSUWC) under the Ministry of Water Resources and Irrigation (MWRI) operates and maintains water supply facilities consisting of water treatment plants and distribution facilities, and collects water charges as well. However, there are challenges for Juba Station to distribute water in planned and

replacement of the aged facilities, b) increase of knowledge on operation and maintenance of water supply facilities, c) establishment of water quality monitoring system, d) updating of customer database, e) arrangement of sufficient equipment for operation and maintenance and f) allocation of sufficient budget. Additionally, its revenue is not sufficient to operate and maintain water facilities, since fixed water tariff system is applied without evaluation of financial situations or water tariff policy, and charge collection system is far from efficient. SSUWC Headquarters (HQ) with 38 staff members has a role to supervise the solutions to technical problems of the stations and to appropriate the budget necessary for O&M of their water facilities. The HQ, however, cannot implement appropriate support for them because of the absence of institutional framework to grasp actual conditions and information exchange system between them

Therefore, South Sudan Government at that time requested the Government of Japan to implement a capacity development project for Juba Station. In response to this, the Government of Japan implemented ‘The Project for Management Capacity Enhancement of South Sudan Urban Water Corporation’ in the period between October 2010 and September 2013 (Phase1). In parallel, development and new water supply system as a grant aid was requested and commenced. Afterwards, South Sudan Government requested ‘The Phase 2 Project for Management Capacity Enhancement of South Sudan Urban Water Corporation’ (hereinafter referred to as “the Project”). JICA conducted a detail planning survey in May 2015, and both sides agreed the project framework and commencement.

2. Approach Undertaken

The Project has been carried out by SSUWC and Japanese Experts to improve water supply service.

(1) Concept of Capacity Development

The concept of capacity development was shared with SSUWC and Experts. The concept is shown in Figure 1.

Concept of Capacity Development Project

To develop the comprehensive capacity to solve problems and grow for future

- At individual and at organizational level
- Technique, skills and knowledge

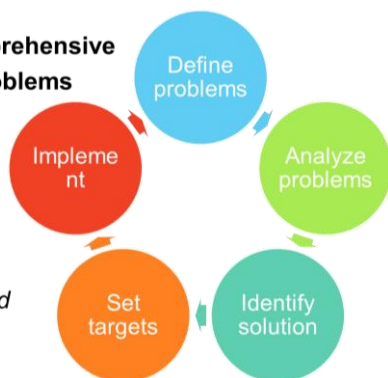


Figure 1 Concept of Capacity Development

(2) Project Purpose and Outputs

Overall goal, Project purpose and Outputs are shown in the box below and the structure of cooperation is shown in Figure 2.

【Overall Goal】
Safe and clean water is supplied in a reliable manner in Juba

↑

【Project purpose】
The capacity of SSUWC Juba Station regarding sustainable service delivery (financial management, non-revenue water management, facilities operation and maintenance) is strengthened

↑

【Output 1】
Water charge collection capacity of Juba Station is strengthened

【Output 2】
Public awareness activities of Juba Station for Juba citizens are enhanced

【Output 3】
Operation and maintenance capacity for new and existing water supply facilities by Juba Station is strengthened

【Output 4】
Management capacity of operation and maintenance for new and existing water supply facilities by Juba Station is strengthened

【Output 5】
Support and supervisory function of SSUWC HQ toward Juba Station is strengthened

Project Purpose and Overall Goal

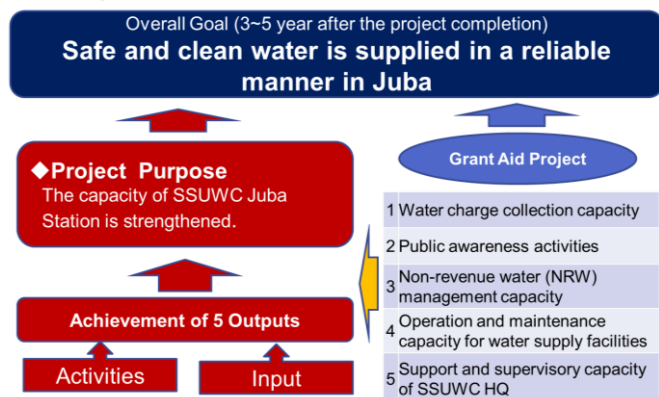


Figure 2 Structure of Cooperation

(3) Enhancement toward PDCA Positive Spiral

The Project has adopted Plan, Do, Check and Action (PDCA) approach for the improvement of water supply service. The Project designs to assist SSUWC to set on the upward positive spiral of water service. The conceptual image is shown in Figure 3.

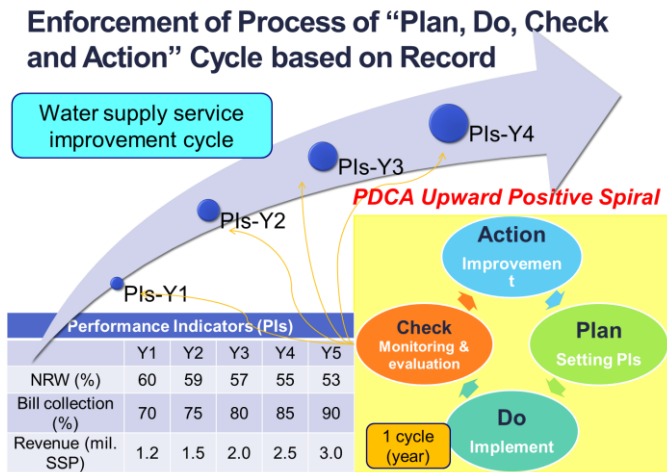


Figure 3 Conceptual Image of PDCA Positive Spiral

(4) Sharing Ideal Images

Prior to the implementation of the Project, ideal images to be achieved at the end of the Project were discussed and shared with SSUWC, which was expected to help the counterparts to have clear images of expected water supply service and the goal of the Project.

3. Capacity Assessment

The Project started in February 2016 and at the beginning stage, Capacity Assessment (CA) was implemented.

CA is expected to contribute to monitor progress of capacity development by recording and comparing the actual situation between the beginning and the ending of the Project. The assessment focuses on two levels of capacity; 1) individual level and 2) organization level, and two aspects of capacity; a) technical capacity and b) core capacity. The characteristics of capacity is shown in Figure 4.

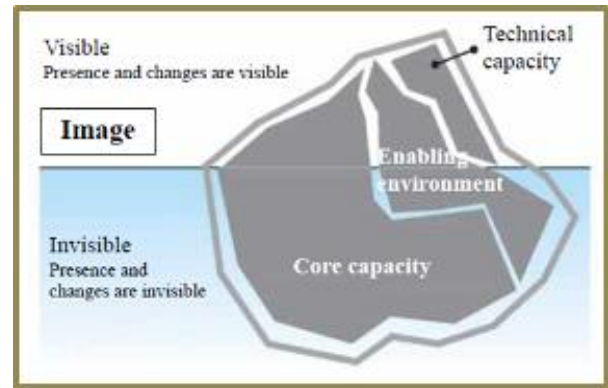


Figure 4 Characteristic of Capacity

The results indicated that the core capacity of planning & monitoring, budget management, staffing and communication were weak in overall. Also, the technical capacity was assessed at low level less than medium score level in the following areas: O&M of purification plant, transmission and distribution facilities, water quality analysis and monitoring, revenue collection and financial analysis, and management of Public Tap Stand and Tanker Filling Station.

4. Situation Changed

At 5 months after the start of the Project, the Project activities in Juba city was suspended due to the political crises happened in July 2016. Without entering South Sudan, JICA decided to continue training in the Third Countries (so-called Remote Training), Kenya and Uganda, by sending SSUWC staff members. The remote training was carried out between October 2016 and April 2019. The training was designed not only by classroom lecture but also by practical training in cooperation with the advanced water utility in Africa, National Water and Sewerage Corporation (NWSC) of Uganda and Kenya Water Institute (KEWI) of Kenya.

In addition, training in Japan and Cambodia for SSUWC HQ was conducted.

5. Results of Training

(1) Remote Training

The remote training was focused on 9 areas, mostly held in Uganda. In the total of Term1 – Term3, 329 counterparts attended the training. Through the training, the counterparts had an opportunity to learn intensive knowledge, skills and expertise from JICA Experts, NWSC and KEWI. The training designs to collaborate especially with resource persons of NWSC by the lecture, the practical training and the on-site training. The number of training attendance is shown in Table 1.

Table1 Number of Training Attendance

| Training Area | Term1 | Term2 | Term3 |
|----------------------------------|-------|-------|-------|
| Meeting for training preparation | 4 | 0 | 0 |
| Financial management | 11 | 31 | 22 |
| Public awareness | 10 | 20 | 5 |
| GIS | 6 | 9 | 3 |
| Non-revenue water management | 4 | 16 | 7 |
| O&M of purification plant | 12 | 21 | 20 |
| Water quality management | 6 | 9 | 5 |
| Distribution pipeline network | 6 | 11 | 14 |
| PTS and TFS | 3 | 0 | 0 |
| Headquarters (HQ) management | 8 | 29 | 37 |
| Total | 70 | 146 | 113 |

[Note]

Term --- Contract period between JICA and Consultants

PTS --- Public Tap Stand, TFS --- Tanker Filling Station



Photo 1 Asset management (Uganda)



Photo 2 O&M of Water Meter (Uganda)



Photo 3 Electro-mechanical equipment maintenance (Uganda)



Photo 4 Pipe connection on demonstration site (Uganda)



Photo 5 WTP operation (Uganda)



Photo 6 Water quality test and monitoring in laboratory (Uganda)

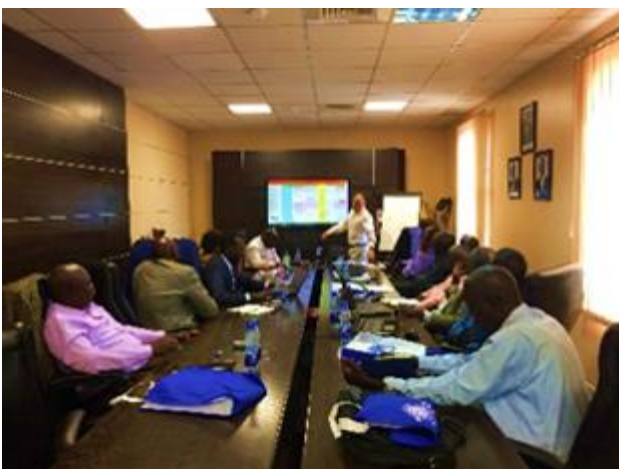


Photo 7 HQ management (Uganda)

(2) Training in Cambodia

Training in Cambodia was carried out for 5 days in collaboration with Phnom Penh Water Supply Authority (PPWSA), which achieved a successful reform after the civil war in Cambodia. A main purpose of the training is to learn the reform history of PPWSA and action for problem solving in the following areas.

- Leadership
- Government support
- External assistance
- Internal efforts
- Restructuring of the management
- Change of culture
- Staff capacity building
- Self-reliance program

In the training, the counterparts had an opportunity to directly have a lecture from H.E. Ek Sonn Chan who successfully led a restructuring of the management with a strong leadership as the former Director General. During the training, the counterparts prepared a reform action plan for HQ and Juba Station of SSUWC.



Photo 8 Site Visit to PPWSA Office (Cambodia)

6. Action Plans for Improvement

Action Plan for Juba Station and SSUWC HQ reform action plan were developed in the remote trainings in Term 2 (in Oct. 2018, Feb. and Apr. 2019) and progress report was presented in Term 3. The main agenda of the HQ reform plan is below.

- (1) Strengthened Institutional Capacity
- (2) Improved Financial Sustainability
- (3) Sustainable, Efficient & Equitable Technical Operations

Following lessons are learnt in the remote training in Term 3 by interviewing NWSC HQ, station and branch.

- Delegation of power for efficient management
- Clear function and target definition by level
- Performance contract management
- Clear reporting and communication system
- Strict and clear financial control
- Motivation and demotivation/punishment system (reward mechanism)
- Appropriate water tariff setting
- Run government enterprise as a commercial enterprise

Based on the lessons learnt, “Initial 100 days Performance Contract” between Juba Station and HQ was developed and employed from April 2019.

7. Recommencement of Activity in Juba City

The security situation of Juba City is getting relatively stable, so that JICA decided to recommence the project activity in Juba City. The Project in Term 4, which is the last term of the Project, has been re-started since September 2019, and will be completed in July 2020. The implementation main approach is to establish management, operation and maintenance procedure based on the experience, OJT, acquired skills and

knowledge in the remote training. Term 4 activities shall be implemented based on the following policies:

- (1) Juba Station’s policies
 - To review and make report about remote trainings
 - To strengthen facility maintenance ability based on remote trainings
 - To implement maintenance management plan developed by Juba Station and to improve operation hour
 - To increase tariff collection and revenue
 - To improve customer service and their awareness
 - To install meters for institutional customer
 - To implement leakage repair trainings with appropriate equipment procured in the Project
 - To monitor and improve the action plan (PDCA cycle)
 - To create better business cycle
- (2) HQ’s policies
 - To review and make report about remote trainings
 - To strengthen management ability based on the remote trainings
 - To monitor and improve the action plan (PDCA cycle)
 - To establish continuous improvement and reform trend
 - To develop and employ operation manuals
 - To conduct and monitor Performance Contract with Juba Station

(Phase2 Project Period: Feb. 2016 – Jul. 2020 (expected))

Reference:

Progress Report of the Project for Management Capacity Enhancement of South Sudan Urban Water Corporation Phase2

Term1: Jan. 2017, Term2: May 2018, Term3: Jun. 2019