

JAPAN INTERNATIONAL COOPERATION AGENCY (JICA) - HALF A CENTURY OF COOPERATION ACTIVITIES FOR THE DEVELOPMENT OF AGRICULTURE IN TANZANIA

In Tanzania, Japan International Cooperation Agency (JICA), implemented a series of cooperation projects that started in 1974 with the formulation of the "Kilimanjaro Region Integrated Development Plan". Thereafter, development projects such as the "Lower Moshi Irrigation Scheme" and the "Kilimanjaro Agricultural Development Center" (currently called as the Kilimanjaro Agricultural Training Center (KATC)) followed suit.



Kilimanjaro Agricultural Training Center (KATC)

Our cooperation activities have now been rolled out to cover the whole country. JICA has two programs in agriculture sector, namely,

- i) Program of Strengthening Rice Production, and
- ii) Program of Supporting Agricultural Sector Development Program (ASDP).

i) Program of Strengthening Rice Production

Under this program, JICA has assisted in disseminating rice farming technologies through various projects, i.e. the Project for Supporting Rice Industry Development in Tanzania (TANRICE2), the Project for Capacity Development for the Promotion of Irrigation Scheme Development Under the District Agricultural Development Plans (TANCAID2), the Small Scale Irrigation Development Project (SSIDP), etc.

TANRICE: Rice production increase and yield improvement achieved

For almost half a century from 1974, JICA and the Ministry of Agriculture in Tanzania have been working together in the field of rice industry development. Through a series of technical cooperation projects, various training programs on rice farming in irrigated as well as in rain-fed conditions were conducted for extension officers and farmers throughout the country. In these training programs, farmers also learned irrigation scheme management, gender, marketing, and agricultural machinery management.

A total of 5,235 farmers were trained in 44 irrigation schemes through the technical cooperation project called TANRICE (2007-2012). Subsequently, in TANRICE phase 2 (2012-2019), these technologies and skills resulted in about 40% increase of rice production under the irrigated condition, 50% increase under rain-fed lowland condition, and 140% increase under rain-fed upland conditions. A total of 36,553 farmers and extension officers were trained through TANRICE2.



Harvesting Time in Lower Moshi Irrigation Scheme

The program also contributed to the implementation of Tanzania's National Rice Development Strategy (NRDS) that aimed at doubling rice production in Tanzania from 899,000 tons in 2008 to 1,963,000 tons by 2018 under the initiative of the Coalition for African Rice Development (CARD). The goal of NRDS phase 2 launched in 2019 is to sustain national self-sufficiency in rice production,

contribute to the regional self-sufficiency, and become a market leader in the region.

According to the statistics of the Food and Agriculture Organization (FAO), rice production in Tanzania is estimated to have increased about 13 times, from 223,000 tons (1974) to 3,016,695 tons (2018) and rice growing area has also increased about 7 times, from 163,000 ha (1974) to 1,199,875 ha (2018). The cumulative irrigated area increased 1.7 times from 264,388 ha (2005/2006) to 461,211 ha (2014/2015), according to the "National Irrigation Development Master Plan 2018" compiled by the joint survey of the National Irrigation Commission (NIRC) and JICA in 2018. Our cooperation through the Program of Strengthening Rice Production has contributed to the above-said achievement to improve rice and irrigation development.

SSIDP & TANCAID2: Comprehensive Guidelines for Irrigation Scheme Development (CGL) as the ground of irrigation development

JICA and NIRC have been promoting participatory irrigation scheme development in line with the CGL. In SSIDP, approximately 32 million USD has been provided for the construction and rehabilitation of small-scale irrigation facilities including head works and canals of up to 109 irrigation schemes in the entire country.

Through these measures, an increase of around 20,000 ha of irrigated area is expected to be achieved. In addition to infrastructure improvement, a total 9,921 people including irrigation engineers and technicians of NIRC and district offices, and members of irrigators' organizations (IO) received training on proper project management and operation & maintenance (O&M) of the facilities as the activities of TANCAID2.

A farmer in Nyida irrigation scheme in Shinyanga told after the training that people started to share water according to the distribution plan that was made based on the manual prepared by TANCAID2, rather than to take water individually. He said sharing water made him contribute to the joint work as IO members in maintenance work of infrastructure. Also a farmer in Mikonbilenga irrigation scheme in Iringa told he was now able to pay school fees for his children, had been able to engage himself in other activities such as livestock keeping and a bar operation.



**Participatory repair work of irrigation canal.
IO members implemented capping technically supported by district and zone staff.**



Completed repair work canal

ii) Program of Supporting Agricultural Sector Development Program (ASDP)

Through this program, JICA expanded its activities to respond to the needs of strengthening the government's Monitoring and Evaluation (M&E) system and promoting value addition and market-oriented agriculture. JICA, together with the Agricultural Sector Lead Ministries (ASLMs) including the Ministry of Agriculture and President's Office Regional Administration and Local Governance (PORALG), is implementing two projects.

- Project for the Capacity Development on Data Collection, Analysis and Data-Based Reporting under ASDP (ARDS)
- Project for Strengthening DADP Planning and Implementation capacity through Use of SHEP Approach (TANSHEP)

Cooperation on Agricultural Sector Development between JICA and Tanzania

ARDS: Agricultural data on the ground is ready to use for evidence-based decision-making

The Agricultural Sector Development Program (ASDP) Monitoring and Evaluation (M&E) Thematic Working Group has been working with the JICA Project Team. The project aims at improving the availability of agricultural information through the Agriculture Routine Data System (ARDS) since 2008. In ARDS, standardized formatted data flow from the ward level to the central government level through the districts and regions has been developed. The data are registered and accumulated into the web portal, which is a web-based application designed and developed for this specific purpose, and reports can easily be extracted from the data. ARDS eventually allows users to capture, process and share the agricultural data through that web-based application. Using this system, over 90% of agricultural information data across the country has been updated every month since 2017. Considering that the submission rate of such data stood at 40% in 2015, it is a remarkable progress in two years. Now, ARDS Web Portal is in full operation across the country wherever there is Internet connection, and the data and reports generated from it are well utilized by the Government.



Dissemination of the training materials for ARDS data collection.

TANSHEP: Transforming agriculture from “Grow and Sell” to “Grow to Sell”

TANSHEP, since its onset in January 2019, has been introducing the new extension approach, Smallholder Horticulture Empowerment & Promotion (SHEP), to 56 farmers' groups in Arusha, Kilimanjaro and Tanga Regions. Whereas conventionally farmers look for market for what they have produced (“Grow and Sell”), in SHEP approach, they undertake market survey before starting production, with which they decide what to produce, how, and when according to market needs (that is, “Grow to Sell”). TANSHEP has provided them with a series of technical training programs, e.g. on market survey, business building with stakeholders, and record keeping. Since these are their first trials, farmers do face some challenges including negative impacts of climate change (e.g. floods) and COVID-19. Some of them, for example, delayed sowing for one month, then observing high prices for initial selling but later, price decline. They have now become more sensitive and they follow the cropping calendar for peak demand. Others are now able to negotiate with several buyers, so as to select the best offer among them, using knowledge of the market survey they got through TANSHEP.



Market Survey by farmers



Helping farmers in making the cropping calendar to meet the peak demand.

In addition to the key cooperation areas depicted above, construction works for the Project for Development of Malindi Fish Landing and Marketing Facilities in Zanzibar commenced in 2019.



Completion images of the Malindi Fish Landing and Marketing facilities (1)

Reforming Malindi Fish Landing and Marketing Facilities in Zanzibar

Through JICA's support, a Japanese contractor started rehabilitating the old erosion-prone Malindi Fish Landing and Marketing Facilities to contribute to the provision of safer and more hygienic working condition for the users, thus promoting stable supply of quality fish to the people of Zanzibar. The facilities are expected to accommodate fishing vessels, create jobs for people in the sector, and increase the earnings of stakeholders in fisheries value-chains, thereby bringing out the potential of blue economy in Zanzibar and boosting it.



Before construction work (December 2015)



After starting construction works (March 2020)