

JICA's Position Paper on SDGs: Goal 2

Goal 2: End hunger, achieve food security and improved nutrition and promote sustainable agriculture

1. Understanding of the presentsituation

(1) Why is support for food security and nutrition improvement necessary?

- ✓ Stable access to safe and nutritious food is the basis of all human activities. In developing countries, approx. 45% of deaths in children under five are related to malnutrition. In addition, as a result of malnutrition during infancy, economic loss equivalent to 10% of GDP is estimated in Asian and African countries.
- ✓ “Halve the proportion of population suffering from hunger,” a goal set in the Millennium Development Goals (MDGs), was almost achieved by 2015. However, approx. 800 million people still do not have sufficient food, and regional disparities are huge. Further efforts to eradicate hunger are necessary.
- ✓ Agriculture is the largest industry, supporting 40% of global employment, as well as the largest sector in developing countries supporting employment and incomes of the poor.
- ✓ Due to the effects of climate change, agricultural damage caused by droughts and floods has become more widespread in recent years.

(2) Japan's efforts

- ✓ Japanese agriculture experienced two large growth periods. The first period was for 40 years when agricultural technology developed by individual feudal domain, spread throughout the country after the Meiji Restoration. The second period was for 20 years after World War II, when modernization of agriculture was achieved in an extremely short period through mechanization and promotion of improved varieties and chemical fertilizers. The periods contain ample knowledge that enables regions in difficulty, particularly those with low productivity and malnutrition problems, to get out of such situations.
- ✓ As Japan is dependent on food importation, which account for 60%, it is always concerned about global food supply and demand. During a food crisis between 2007 and 2008, Japan took a leading role. For example, it held a G8 summit at the Hokkaido Toyako Summit, discussed about global food security and called for the meeting of agriculture ministers to work on food security for the first time as a G8 member, and organized the “G8 Leaders Statement on Global Food Security.” Japan has also provided a wide range of agricultural support to developing countries throughout the world. In recent years, through the framework of TICAD, it implemented CARD (Coalition for African Rice Development), an initiative to support the expansion of rice production in Africa, and SHEP (Smallholder Horticulture Empowerment Program), an initiative to support transition to commercial agriculture. In addition, at TICAD VI held this year, it established IFNA (Initiative for Food and Nutrition Security in Africa), a framework for food and nutrition improvement in Africa.
- ✓ Since the private sector has assumed an important role in working out solutions to nutrition problems in recent years, Japan is making efforts to support developing countries in collaboration with the private sector, through the frameworks:

“Platform to promote nutrition improvement projects” and “Global food value chain,”¹ etc.

(3) JICA’s strength

- ✓ Development of technology to increase agricultural productivity, and dissemination of the technology to the field level to increase the incomes of farmers
Based on its experience in Japan and by enhancing technology transfer to extension workers and support systems for farmers’ organizations, JICA has implemented many projects directly linked to increasing productivity and profitability at the field level. Knowledge and human resources accumulated through the projects can be effectively used in future cooperation.
- ✓ Support for rice and other irrigated agriculture
Since rice is the most important product for Japanese agriculture, JICA has a wealth of technical knowledge on rice. By using its experience, JICA has provided support for rice and other irrigated agriculture in Monsoon Asia with similar food culture and climate conditions to Japan, and realized many achievements. In recent years, it has supported increased rice production through CARD in African regions, where rice demand is rapidly growing.
- ✓ Accumulation of technical and institutional experience during the growth period of Japanese agriculture
Great results have been achieved by past efforts: intensive agricultural approaches during the modernization of agriculture, such as dissemination of improved varieties and effective use of chemical fertilizers; increased labor productivity through agricultural land development and mechanization; improvement of technology for irrigation development and maintenance, and farmer led irrigation management through land improvement districts; and nutrition improvement at the household level through promotion of public education, public health and projects for better life. Experience gained through these efforts may be effectively used in other regions.
- ✓ Accumulation of diversified experience for solving nutrition problems
In relation to maternal and child health improvement, JICA has carried out a wide range of activities in developing countries. It has also worked on the solution of nutrition problems from the perspective of improving maternal and child nutrition, as well as the improvement of food supply and food diversification through agricultural cooperation.
- ✓ Multisector efforts
JICA has experience and expertise in various sectors such as agriculture, health, and education, etc., and has cooperation schemes enabling collaboration with the private sector and NGOs. These make JICA in a good position to make multisector efforts. Particularly in terms of nutrition, a nutrition taskforce was established within JICA in 2015, and a structure to share and use the knowledge of related departments was introduced by the taskforce.

¹ The platform to promote nutrition improvement projects was established in September 2016. It is a framework to work on nutrition improvement in developing countries through public-private collaboration. JICA has participated in the platform as the co-chair. The global food value chain is an initiative to support the economic growth of developing countries and overseas development of the Japanese food industry using strengths of the Japanese food industry and through industry-government-academia collaboration.

2. Priority targets

Goal 2 has eight targets. Based on Japan's initiatives and JICA's cooperation achievements and strengths in the fields of food security and nutrition, dynamic development will be promoted for the benefit of all people so as to proactively contribute to the following targets:

[Core target for problem solution]

2.1 End hunger and ensure access by all people to safe and nutritious food

[Targets to be particularly focused on due to slow international response]

2.2 End all forms of malnutrition and address nutritional needs

2.3 Double the agricultural productivity and incomes of small-scale food producers

2.4 Ensure sustainable food production systems and implement resilient agricultural practices

[Challenges to be addressed in efforts²]

2.5 Promote access to, and fair and equitable sharing of, benefits arising from the utilization of genetic resources

2.a Increase investment in order to enhance agricultural productive capacity

3. Priority efforts to achieve the goals

(1) Sustainable productivity improvement (Sufficiently supply of quality food)

- ✓ From the perspective of using resources effectively, efforts will be made to provide a stable food supply for the entire region or country by promoting agricultural development focused on areas with high production potential. Specifically, through CARD and other initiatives, efforts will be made to: (1) Expand the irrigation area, (2) Develop stable, high-yielding production technology through the combination of improved varieties and appropriate fertilizers, and (3) Strengthen a system to effectively disseminate the technology.
- ✓ Aiming to provide a stable food supply and increase incomes in rural areas, efforts will be made to strengthen the value chain, including processing and distribution of agricultural products through SHEP and other initiative, and to support the distribution of high-quality, high value-added agricultural products through GAP (Good Agriculture Practice), etc.

(2) Promotion of nutrition improvement through agriculture and food (Consumption of safe and nutritious food)

- ✓ By making use of IFNA and other frameworks, efforts will be made to improve nutrition through agriculture and food, through the following activities:
 - 1) Applying Nutrition lens: Add nutrition perspective on conventional agricultural project such as, awareness raising through nutrition education, monitoring

² As for the sharing of benefits associated with access to genetic resources, information will be thoroughly communicated to stakeholders, particularly those involved in projects on research and development, and efforts will be made to form a consensus in accordance with international rules. As for increased investment, the possibility of collaboration with local distribution and processing sectors and local Japanese enterprises will be examined when each project is formed.

and evaluation of nutrition status, etc. (e.g. introduction of horticulture cropping system into irrigation projects, adding home gardens, nutrition education, and cooking practice, etc., to rural development projects, and school meals using local agricultural products, etc.).

- 2) Multisector approach: Efforts will be made to improve nutrition through multisector approaches involving the agricultural sector, health, educational, and other administrative organizations, private businesses in food processing and restaurant industries, regional residents, and NGOs, etc. For effective collaboration, action plan development and activities will be supported at the national and regional levels.
- 3) Nutrition improvement during the first 1,000 days: Focusing on the first 1,000 days from the fetal period in the womb to two years of age, evidence-based nutrition support will be provided, such as promoting the nutritional value of exclusive breast-feeding, and the development and dissemination of appropriate complementary food for infants through collaboration with private businesses, etc. In addition, maternal handbook assistance to support continual maternal and child care will be focused on.
- 4) Evidence-based activities: To promote quantitative evaluation on the impact of efforts for nutrition improvement, monitoring activities will be supported, and knowledge obtained through the database will be shared among member countries and organizations.
- 5) Formulation and implementation of a project incorporating gender perspective: Based on gender disparities confirmed in the food system, from food production to food consumption, the project will promote increased productivity by improving women's access to resources, land, and information, as well as nutrition improvement by enhancing maternal and child health and nutrition services.

(3) Strengthening of resilience (Stable procurement of appropriate food)

- ✓ Climatic damage due to the effects of climate change may have a greater impact on future food security. Therefore, sustainable agriculture should be promoted while reducing the impact and conserving natural resources and ecosystems. To do so, support will be provided for: (1) Establishment of a farming system preventive to natural disasters, and (2) Early recovery from natural disasters, focusing on vulnerable groups, such as women, youth, and small-scale farmers, etc.
 - 1) Establishment of a farming system preventive to natural disasters (Promotion of Climate-Smart Agriculture)
 - ✓ Establish a farming system preventive to natural disasters through appropriate combination of various element technology.
 - Improvement of access to water resources: Introduce irrigation adapted to local water resources and cropping pattern
 - Efficient and sustainable use of natural resources: Promote sustainable use of soil and water resources through introduction of drip irrigation and supplemental irrigation, utilization of terrace farming, deep tillage, ridge, mulching and organic fertilizers, and water harvesting, etc.
 - Improvement of farming management: Reducing damage in case of

disaster through diversification of risks by combining stress resistant varieties including environmental stress (resistance to drought and high temperature, etc.) and pest/disease stress, and through restoration and improvement of soil fertility by combining water-saving cultivation, crop rotation, and fallowing

- ✓ By using ICT, provide necessary services to small-scale farmers who do not have sufficient access to existing technical information, market information, and financial services, etc.

2) Support for early recovery from natural disasters

- ✓ Work to develop and disseminate index based climate insurance through collaboration with private businesses, improve access to recovery funds through financial institutions, and restore damaged irrigation facilities and other agricultural infrastructures
- ✓ Strengthen communities through collaboration with consumer education and consumer activities
- ✓ Reduce risks by diversified income sources: As part of rural development through strengthening of the value chain, income sources will be diversified by introducing mixed farming combining various items including livestock and horticulture, as well as introducing the One Village One Product movement and crop processing.