

ILSI Japan CHP Newsletter

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Project PAN



Luncheon seminar was co-hosted at the 26th Japanese Society of Health Education and Promotion

In the 26th Japanese Society of Health Education and Promotion Academic Conference held at Waseda University (Shinjuku-ku, Tokyo), a luncheon seminar "Elderly Health and Health Promotion" was held in collaboration with ILSI and Ajinomoto Co., Ltd.

First, Mr. Hisamine Kobayashi of Ajinomoto Co., Ltd. gave a lecture titled 'Protein, and amino acid intake' useful for prevention of Sarcopenia', in which he discussed the prevention of Sarcopenia and Locomotive Syndrome which affects the health of the elderly. Efficient muscle protein synthesis can be improved by ingesting essential amino acids high in leucine content (Amino L 40).

Next, a lecture titled "Practice of Health Promotion in Region" was given by Ms. Kimura of ILSI Japan. She introduced activities in the region focusing on health promotion. The seminar was successful with standing room only audiences and active discussions. (June 24, 2017)

“Ishinomaki Take10!®”

A new team started at Ishinomaki Sensyu University.



What's Project PAN (Physical Activity and Nutrition)?

To promote healthier aging, Project PAN seeks to prevent **lifestyle-related diseases** including **obesity** among middle-aged people and **enhance the QOL of the elderly**. Project PAN develops scientific evidence based programs to promote physical exercise and to improve the nutritional status of people by improving their lifestyles.

ILSI Japan CHP is pursuing two programs named “TAKE10!®” and “LiSM10!®”.

LiSM10!®

ILSI Japan CHP developed “LiSM10!®” (Lifestyle Modification) that supports improvements of risk factors of lifestyle-related diseases of employees in **worksites**. This program focuses on health promotion for physical activity and dieting after medical check-ups in worksites.

“LiSM10!®” consists of 1) Individual objective setting and recording implementation. 2) Individual and periodical counseling by professionals to support individual program for 6 months, and 3) Support programs from worksites and families of individuals.

TAKE10!® for the elderly

Aiming to support “Healthier longevity” among the elderly and to reduce costs of the national health care program, ILSI Japan CHP developed TAKE10!® for the elderly. The program is featured by effective and unique combination of **appropriate physical activity** and **proper dieting habits**, which is different from conventional programs for preventing lifestyle-related diseases of adults.



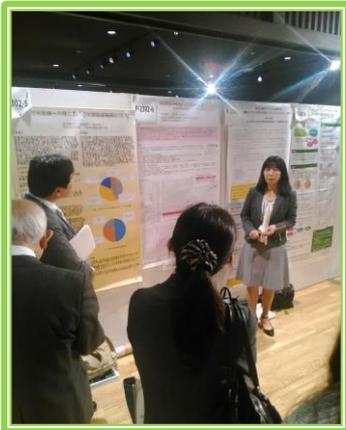
After the Great East Japan Earthquake, while participating in Professor Yamazaki's seminar in the Management Department of Ishinomaki Senshu University, ILSI began conducting 'Ishinomaki Take10!' classes, in which mainly students participated.

It is its 3rd generation now, and the sense and style of the students are changing little by little. So we have decided to shift from activities focused exercise to food and nutrition.

Meanwhile, we received a request from a student volunteer team of reconstruction assistance in faculty of human studies established after the earthquake that they would like to work on Take10!. So, in July 2017, we presented a lecture to them on Take10! Their activities started in November 2017 at meeting places in the temporary housing complexes.



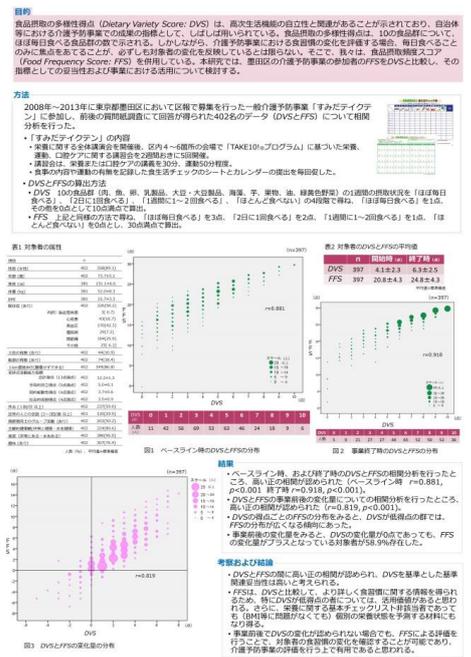
Poster presentation at the 76th Annual Meeting of the Japanese Society of Public Health (Kagoshima)



We presented a poster presentation on the appropriateness of food intake frequency score in a long-term care prevention project - comparison with dietary variety score of food intake.

Dietary Variety Score of food intake (DVS) counts the amount of 10 food-groups consumed daily (a range from 0 to 10), and is used as an outcome measure of the Nursing Care Prevention Project, especially for nutrition improvement by local governments. However, we think that focusing on daily intake does not always reflect changes in the

subject's eating habits. Therefore, we developed a new index the "Food Intake Frequency Score" (FFS) that is on a scale from 0 to 30 with changes in frequency. In this analysis, we confirmed that there is a high positive correlation between the Dietary Variety Score and Food Intake Frequency Score (criterion-related validity). In addition, because the Food Intake Frequency Score can give more detailed information on dietary habits, it may be more useful in the Nursing Care Prevention Project. (November 1, 2017)



The 13th year of "Sumida Take10!" was successfully implemented.

This year, we used 3 venues, including a new venue the Sumida Ward General Gymnasium, and held 8 courses (4 months). Since this project covers only the first participants, we also support the establishment of voluntary circles for those who have completed the course to continue Take10!. Six circles whose group names were made up of the name of the place or the origin of formation such as "YY Take10!", "Nadeshiko Take10!", "Tachibana Take10!", "Nanatsuboshi Take10!", "Sunflower Take10!", and "Sky Take10!" have been formed so far. (November 29, 2017)



TAKE10!@ Progress to Date

The "Sumida TAKE10!@" program for elderly long-term care prevention was started by Sumida Ward Government, (Tokyo) in October 2005, and more than 1,250 elderly people have taken part in the program over thirteen years. The program is conducted at three to six sites and includes lecture sessions on the program and physical exercise sessions. This is designed to be an intervention study and the results have regularly been reported at the annual meeting of Japanese Society of Public Health. Particularly, the results of the 2005 Sumida TAKE10!@ intervention study were published in the international journal "BMC Geriatrics". <http://www.biomedcentral.com/1471-2318/13/8>. In addition, the results of 2008-2013 Sumida TAKE10! Program were published in the Japanese Journal of Public Health. http://www.jspsh.jp/member/docs/magazine/2016/11/63-11_682.pdf.

Having received mandates from local governments all over Japan, the Social Welfare Corporation, Silver Human Resources Centers, and some volunteer groups, we have trained TAKE10!@ peer leaders, supporters and instructors. There are always several TAKE10!@ programs being concurrently implemented in different regions across Japan. Details can be found at <http://take10.jp/chapter6.html>. Also, please have a look at this video on the TAKE10! activities <https://youtu.be/v45tm8hjvBk>.

To prepare TAKE 10! @ leaders and supporters to hold nursing care prevention classes smoothly, we develop manuals for instructors so that they can respond to requests from various locations across Japan.

Project IDEA

“Survey of Lysine Intake and Opportunities for Improving Lysine Intake in India”

The final reports have been submitted on the collaboration between St. Johns Research Institute, Dr. Kurpad and ILSI Japan CHP, which started in August 2016, on “Survey of Lysine Intake and Opportunities for Improving Lysine Intake in India”. The reports consisted of 2 parts and Part 1 was “Defining the Risk of Dietary Quality Protein Deficiency in India”, and Part 2 was “Agro-economic Study of Lysine Supply in India and Mitigating the Risk of Quality Protein Deficiency”.

The results of Part 1 have already been published in the Journal of Nutrition (J. Nutr.-2017-Minocha-jn.116.243980)

“Work-place Nutrition Improvement Project by Introduction of Fortified Rice in Cambodia”

The Nutrition Japan Public-Private Partnership Project (NJPPP) was initiated by the Japanese Cabinet Secretariat, Office of Healthcare Policy 2 years ago. Under this project, the “Work-place Nutrition Improvement Project by Introduction of Fortified Rice in Cambodia” project was approved last year. In order to investigate the potential feasibility of this project, 2 members of ILSI Japan CHP visited government agencies, the international NGO (RACHA), and private companies from Japan in Cambodia during September 2017 and investigated whether the introduction of fortified rice to lunch menus in work-places could improve the nutritional condition of workers. In addition, a seminar was given to the people in charge of this project in February 2018.



What's Project IDEA

(Iron Deficiency Elimination Action) ?

The difficulty in maintaining a variety of food sources results in malnutrition and micronutrient deficiencies in the developing countries. Iron deficiency anemia, one of the most prevalent threats to public health, impairs brain development, immune system functioning, and learning ability in infants and children. It can also be a major cause of death among pregnant women, and dramatically reduces productivity among working adults, which in turn hinders the struggle against poverty. The UN ACC/SCN (the United Nations Administrative Committee on Coordination/ Sub-Committee on Nutrition) reported that 1.6 billion people suffer from iron deficiency anemia, and that it has been more difficult to overcome this than other micronutrient deficiencies.

Project IDEA works to reduce iron deficiency anemia (IDA) in developing countries by adding iron to commonly-eaten and commercially- produced foods such as condiments and staples, based on the dietary patterns unique to each country.

Achievements of Project IDEA to Date

In the Philippines, ILSI Japan CHP has worked with FNRI on the stability and acceptability of several alternatives for the fortification of rice with iron. The overall evaluation indicated that extruded rice with ferrous sulfate and micronized ferric pyrophosphate are the most stable and have the most acceptable taste and color. An efficacy study was conducted for 6 months in 2004 by means of an intervention program using primary school pupils 6-8 years old in Metro Manila. The intervention program demonstrated that both of fortification alternatives significantly improved anemia prevalence. A market trial started in April 2008 and confirmed the effectiveness in Orion Municipality. In Cambodia, fish sauce fortified with NaFeEDTA was introduced in Kampot in March 2007 and Siem Reap in August. ILSI Japan CHP is working with RACHA to promote social marketing programs, to establish quality monitoring of the market and to establish a surveillance system for monitoring IDA. The effectiveness of the fortification was confirmed. Akzo Nobel is supporting the project by donating NaFeEDTA. A literature search on complementary feeding resulted in the report “Towards improved infant and young child nutrition in Asia through appropriate complementary feeding” which can be used as a basis for the research and development of complementary feeding. In Vietnam, in collaboration with National Institute of Nutrition (NIN), ILSI Japan CHP has pursued iron fortification (NaFeEDTA) of fish sauce. A series of studies verified that regular consumption of iron-fortified fish sauce significantly reduced the prevalence of anemia. Iron-fortified fish sauce was launched in 2006 based on the scientific outcomes of the research and development. The plan calls for 10 large production plants to produce fortified fish sauce by 2009. With financial support from GAIN, the national launch is scheduled in 5 years, which will include programs for production/distribution, quality assurance, communication of nutrition and health and monitoring/surveillance. ILSI Japan CHP will continue to provide professional support to ensure a successful national launch. In China, the Iron Fortified Soy Sauce Program was launched in 2004 as the national policy to prevent anemia by ILSI Focal Point in China and CDC China.

Project SWAN



Presented during a poster session at the 21st International Congress of Nutrition

The outcomes of the “Project to support educational activities for mothers to improve the quality of complementary food in rural Vietnam” were presented during a poster session at the IUNS 21st International Congress of Nutrition (ICN) which was held in Argentina in October 2017. The project was implemented between April 2014 and March 2017 in collaboration between ILSI Japan CHP and National Institute of Nutrition (NIN), Vietnam, with the financial support of AIN (Ajinomoto International Cooperation for Nutrition and Health). The summary of the presentation are as follows:



As an undernutrition prevention service of the commune health centers, trained village health workers provided nutrition and food safety information for mothers who have children between 6 and 23 month olds by using several communication channels such as periodical loudspeaker announcements, cooking classes, flip chart

communication during household visits. Then, ILSI Japan CHP and NIN evaluated whether mothers became capable to prepare nutritionally balanced and safe complementary food for their children as results of these information, communication and education (IEC) activities. Subsequently, we measured the following 6 outcome indicators at baseline and endline: i) Minimum Dietary Diversity, ii) Minimum Meal Frequency, iii) Minimum Acceptable Diet, iv) Handwashing with soap (children), v) Handwashing with soap (mothers), and vi) food hygiene behaviors of mothers. The study involved 329 mother and child pairs in the baseline survey and 376 pairs in the endline survey. As this is a repeated cross-sectional study where we randomly selected different mother and child pairs between baseline and endline, it allows us to evaluate if the nutrition services have reached entire communities over time. As results, the IEC activities were effective in altering the minimum dietary diversity, minimum acceptable diet, children and mothers' handwashing with soap over time. In addition, a combination of more than two IEC channels tends to lead nutritionally balanced and safe complementary food preparations. These findings suggest that the IEC activities on complementary feeding and hand hygiene were successful in reaching the target populations in all communities studied.

What's Project SWAN (Safe Water and Nutrition)?

WHO has reported that 780 million people do not have access to safe countries the intake of unsafe water and unhygienic environments cause diarrhea and infectious diseases among children. This interferes with the intake of necessary nutrients, resulting in malnutrition. Even if water treatment facilities exist, it is often found that these facilities are not properly designed and that proper treatment is not conducted, including the use of chemicals to remove contaminants, resulting in the failure to meet WHO microbiological and chemical standards.

Project SWAN aims to establish sustainable water supply and health management models in rural and suburban areas through a participatory approach with inhabitants by enhancing knowledge of drinking water, nutrition, food hygiene and sanitation at the household level, optimizing the operation of water treatment facilities to meet Vietnamese standards, establishing effective management systems to sustain safe water supplies and promoting health communication by community-based participatory approaches.

It is expected that these models will be applicable to and can be expanded to other rural and suburban areas in Vietnam.

Achievements of Project SWAN to Date

Vietnam: With an emphasis on rural areas in developing countries in Asia, where public water works are lacking, ILSI Japan CHP has been working on the Project SWAN in collaboration with the National Institute of Nutrition since 2001. Project SWAN features a unique concept, combining a water technological program and an IEC (Information, Education and Communication) program into one project, taking a cross-sector approach.

Based on the preliminary investigations, a project “Participatory approach for improving safe water supply, nutrition and health environment: SWAN1 (2005-2008)” and the SWAN2 (2010-2013) in Hanoi and Nam Dinh Province were supported by JICA (Japanese International Cooperation Agency) as a grassroots technical assistance project. The SWAN1 was completed in 3 villages with great successes at the community level such as safe water supply by water management unions, and the improvements of nutrition and health conditions. The Phase 2 intended to enhance cross-sectional cooperation and to improve community-support by building up Working Team at national government level and Support Team at provincial/district level. Almost 120,000 people across 16 villages benefited by the SWAN2. Since 2013, the SWAN3 has been carried out in Hanoi and Nam Dinh Province, where we intend that Vietnamese provincial authorities adopt SWAN's programs for their water and health related programs. Since 2014, with a focus on the nutritional aspects, we have been implementing a 3 years project “Project to support educational activities for mothers to improve the quality of complementary food in rural Vietnam” in Thai Nguyen and Bac Giang Provinces. The project has been supported by AIN (Ajinomoto International Cooperation Network for Nutrition and Health). **Indonesia:** Since 2013, in collaboration with ILSI SEAR (Southeast Asia Region), we are developing project components in Indonesia.