Fukushima Appeal: "Nuclear Power Plants Cannot Coexist with Organic Agriculture"
～ Let Us Reflect on the IFOAM World Congress in Turkey, 10 Years Ago

Introduction

Ten years ago, in October 2014, a Japanese man stood before the audience at the IFOAM World Congress in Istanbul, Turkey. His name was Seiju Sugeno, an organic farmer from Fukushima, Japan.

He shared his heartfelt message: "Nuclear power plants and organic farming cannot coexist. Only organic farming can restore land contaminated by radiation."

His words, which later became known as the "Fukushima Appeal," were met with resounding applause. It was three and a half years after the Fukushima nuclear accident.

Now, a decade later, IFOAM Japan calls on organic farming stakeholders in Japan and worldwide to revisit the "Fukushima Appeal." This is because, on December 17, 2024, the Japanese government announced a new energy policy that once again prioritizes nuclear power.

Following the Great East Japan Earthquake and the subsequent nuclear disaster in 2011, Japan adopted a policy of minimizing its reliance on nuclear power plants. However, the government has reversed this policy and has instead explicitly declared its intent to 'maximize the use' of nuclear energy as a primary power source.

The Japanese government seems to treat the Fukushima nuclear disaster as a distant memory, but we must not forget. The decommissioned nuclear plants still contain radioactive contamination, and many evacuees remain unable to return home. Radioactive contamination is not just a thing of the past—it remains a present and ongoing reality.

That is why we must recognize the efforts of the people of Fukushima, who have risen from adversity to shape a vision for the future. In particular, we should pay attention to the efforts of organic farmers and those working to promote renewable energy.

The "Fukushima Appeal" embodies the essence of this vision. It is grounded in the hard-earned experience that organic farming is key to restoring land contaminated by radiation. That's why we sincerely hope people around the world will read the "Fukushima Appeal" once again.

Fukushima Appeal

The following is a report of an interview conducted by members of IFOAM Japan on December 8–9, 2024, when they visited Seiju Sugeno's home in Nihonmatsu City, Fukushima Prefecture.

We hope this report will help you understand the present and future of the Fukushima Appeal.

2011.3.11 Fukushima Nuclear Power Plant Accident: A Global Symbol of Nuclear Disaster

Does the world still remember March 11, 2011?
On that day, one of Japan's most powerful earthquakes hit eastern Japan. The earthquake and tsunami severely impacted the Fukushima Nuclear Power Plant, a major nuclear facility in the region.

Fukushima had 10 reactors. Three of them melted down, releasing radioactive materials into the environment.

Evacuation orders were given for 12 cities and towns, affecting 164,865 people. Radiation affected all residents in the surrounding area. All nuclear reactors were slated for decommissioning. Melted uranium fuel remains trapped inside the containment vessels, still awaiting removal.

Ongoing Challenges in Agriculture, Fisheries, and Environmental Recovery

Agriculture, forestry, and fisheries were among the hardest-hit sectors. Many farmlands became unusable due to radioactive contamination. In cultivable areas, farmers had to contend with residual radiation levels for a long time.

Among the dispersed radioactive substances, the greatest challenge was dealing with cesium-134 and cesium-137, which have relatively long half-lives. Efforts included removing topsoil, using sunflowers to absorb radioactive materials, and applying potassium chloride to reduce their transfer to crops. Although more fields were decontaminated, some were still unsuitable for cultivation.

Decontaminating mountainous regions presents significant technical challenges. In Japan, where 70% of the land is mountainous, people have long relied on nearby wooded areas, known as Satoyama, for their livelihoods. Since radioactive cesium tends to accumulate in the surface layer, the traditional practice of using fallen leaves as compost has become difficult. The full extent of contamination in commonly foraged wild vegetables and other crops remains unclear. Additionally, shiitake mushroom farmers who used logs for cultivation were completely devastated.

A later investigation found that radiation levels in rivers, which supply agricultural and drinking water, remained below safety standards for potable water. This was due to radioactive material being trapped in the

bottom mud of dams, significantly limiting its runoff into the river. Amid many challenges, this offered an unexpected silver lining.

On the other hand, ocean contamination remains a serious issue. The uranium fuel from the melted reactor cores has fused together, and cold water is continuously circulated over it to keep the temperature down. Naturally, this water becomes contaminated with radioactive materials, mixes with rainwater, and increases by about 90 tons per day. This contaminated water is treated before being discharged into the ocean. The government refers to it as "treated water" and asserts its safety, but tritium levels continue to be monitored. In Japan, not all consumers fully trust the government's claims.

Facing Recovery from the Nuclear Accident: Sugeno’s Story

Despite this, the government has once again decided to shift toward an energy policy that promotes nuclear power. Many people are outraged by the government’s "change of heart," which appears to disregard the tragedy of Fukushima. One such individual is Seiju Sugeno, a 66-year-old

farmer from Nihonmatsu City, located about 50 km inland from the Fukushima nuclear power plant.

He currently grows rice, vegetables, and beans; sells rice cakes and red rice with his wife; and offers farm stays for urban residents to experience farming.

Immediately after the nuclear accident, residents from areas near the power plant evacuated to Nihonmatsu City to escape radioactive contamination. The number of evacuees reached 1,500 in the Nihonmatsu Towa district, where Sugeno lives, and 3,000 in all of Nihonmatsu City. As a result, Sugeno and his colleagues dedicated themselves to supporting them.

Meanwhile, shipments from his fields were suspended, and farmers were forced to halt their work.

"I never imagined that our area would be affected by the nuclear accident," he recalls.

In late March, shortly after the accident, one organic farmer was driven to suicide. All his cabbages, ready for shipment, were contaminated and had to be destroyed. Within a 30 km radius, some dairy farmers, having lost hope, took their own lives. In his suicide note, one reportedly wrote, "Don’t let the nuclear power plant defeat you." It was undoubtedly a heartbreaking experience.

After the accident, many people continued to evacuate. Some of Sugeno’s neighbors also left Fukushima, seeking refuge with relatives and friends. However, he chose to resume farming in his hometown of Nihonmatsu.

Protecting Satoyama: Sugeno and His Friends' Efforts for a Sustainable Community

Sugeno's hometown is the former Towa district of Nihonmatsu City, a mountainous area with a current population of 5,256. This area, known as "Satoyama," is where people live in harmony with nature. The rice terraces in the mountain valleys are beautiful, and in summer, fireflies light up the rice fields.

Before the earthquake, Sugeno had already been delivering organic produce directly to consumer cooperatives, consumer groups, and private schools that used his produce for school lunches in Tokyo and nearby areas. He did this because he valued the "face-to-face exchange" between consumers and producers.

Sugeno also organized farm experience programs, connecting urban consumers with local farmers. Farmers set up guesthouses for overnight stays, and as many as 20 facilities were created. The Towa district became known as an "organic farming village" and a place where visitors could enjoy the unique beauty of Satoyama and experience local life.

These efforts evolved into broader community-building initiatives, with locals working together to preserve the area's natural beauty and ecosystems. When plans emerged to build an industrial waste disposal site, local residents opposed the project and instead proposed a composting facility. They also suggested building a "roadside station" to promote local agricultural products, with Sugeno leading the effort. The facility became a community hub and created valuable local jobs.

Rebuilding Hope: How Organic Farming Helps Overcome the Nuclear Accident

However, this community-building initiative, rooted in organic farming,

was suddenly at risk of collapse due to the nuclear accident. On March 17, just after the nuclear accident, the government set "provisional regulatory values" for radioactive materials in food, and food shipping restrictions were enforced starting on March 21.

As a result, Sugeno could not ship any of the vegetables he had grown. He was also unable to farm or transport goods due to a fuel shortage. This was the most difficult time for him, but he was still ready to start farming at any time.

Fortunately, radiation levels in Towa's soil remained below the provisional standard, allowing him to resume farming in mid-April. He introduced radiation measuring equipment and began to measure contamination levels himself.

Learning from the experience of Chornobyl, he made repeated improvements to his cultivation methods, such as deep plowing and spreading lime, successfully halving the detected radiation levels. Recognizing these efforts, researchers from four universities, including Niigata University (a member of the Japanese Society of Organic Agriculture), conducted a comprehensive survey of Satoyama’s water and forests.

Thanks to this survey, it was found that organic matter in organic farmers' fields absorbs radioactive cesium. Subsequent studies revealed that Towa’s soil is rich in clay minerals and potassium, which prevent cesium from transferring to crops. Sugeno and his colleagues were amazed, calling it the "power of the soil" in the Towa area.

The researchers, organic farmers, and local residents worked together to create a "reconstruction program" covering Satoyama’s forests, water sources, agricultural soil, rice, and household food, aiming to clarify the extent of contamination. As a result, they found that even when soil contamination levels were high, only trace amounts

transferred to crops. Even right after the nuclear accident, some crops were found to be below the detection limit (ND), offering a glimmer of hope.

Fukushima's Dream: A Sustainable Society Where Children Can Run Freely Through Rice Fields

However, consumer fears about radioactive contamination have been difficult to ease. Sales to urban consumers and the supply of products for school lunches have been halted. Additionally, sales at the roadside station (known as "michino-eki" in Japanese), which they operated as a community hub, have dropped by half.

They shared their radiation measurements with consumers, explaining that the crops were well below national safety standards. They also discussed their efforts to reduce soil contamination levels as producers.

Even after explaining that "radioactive cesium remains in the soil, but it was not detected in rice or in fields cultivated through deep plowing," some consumers still responded, "But radiation is still in the soil. No matter how hard producers try, we can't feed Fukushima-grown products to children."

Despite this, Sugeno and his team continued to work tirelessly to ensure safety. Since 2013, they have conducted comprehensive testing of brown rice, achieving a 99% non-detection rate (detection limit: 12 becquerels) over the past five years.

In the years following the nuclear accident, interest in renewable energy has significantly increased in Fukushima, particularly in solar power and biomass. Renewable energy has become an important theme for the region, with a focus on small-scale energy systems that can coexist with local communities. Alongside organic farming, these systems are seen as

essential to the "hometown development" that Sugeno and his team envision, rooted in recycling and sustainability.

One notable initiative in Fukushima is "solar sharing" (agricultural solar power generation), where solar panels are mounted on poles above farmland, allowing agriculture and power generation to coexist. As of 2023, there are 123 such sites in Fukushima, with plans to expand to 25,000 by 2040. It is expected to supply 30-40% of Fukushima’s electricity needs.

Sugeno and his team see these efforts as part of a "transition to a people-centered society."

The nuclear accident created a lasting divide between urban and rural communities, including farming, mountain, and fishing villages. As of December 2024, 19,849 people who evacuated from areas near the nuclear plant are still unable to return and are living outside Fukushima Prefecture. All of them are from agricultural and fishing regions.

Some may assume that production can resume once radiation levels decline. However, once a community is destroyed, it is difficult to restore it. Restoring abandoned fields to their original productivity is particularly difficult. The nuclear accident has shown how easily the harmony between a community and its natural environment can be disrupted. Fortunately, in Nihonmatsu City, the combined efforts of scientists, producers, and residents, along with the region's favorable soil conditions, have led to some progress in rural revival.

More young people are moving to Fukushima, seeking a lifestyle aligned with their values, away from the mass production and consumption of city life. They are turning to organic farming, and the number of new and returning farmers in Fukushima Prefecture has exceeded 300 annually in

recent years. This offers great hope for the future.

Sugeno says, "The Fukushima disaster is not over, but the baton is now being passed to the next generation." He calls this the "Fukushima Dream." His dream is to build a sustainable society where children can run freely through rice fields. In his 2014 "Fukushima Appeal," Sugeno concluded with the following:

"Let's work together to build a society without nuclear power plants, connected by local communities."

A Turning Point for a Better Future

On December 17th, the Japanese government announced a significant shift in policy toward promoting nuclear energy. Only a week earlier, on December 10th, the 2024 Nobel Peace Prize was awarded to Hibakusha (survivors of the atomic bombings of Hiroshima and Nagasaki). The award honored their long and painful struggle since 1945. During the Oslo ceremony, Terumi Tanaka, representative of the Japan

Confederation of A-bomb Victims Organizations, delivered a powerful speech, urging, "Let’s work together to build a world free from nuclear weapons and war."

We should support not only Mr. Tanaka's call, but also learn from the efforts of Mr. Sugeno and his colleagues, who advocate for a society where all forms of life are given the highest priority and nuclear power plants are seen not as a solution but as a realistic threat, and also propose organic farming as an alternative.

IFOAM JAPAN
Written by Katsu Noda and Toshiaki Takahashi
Photographed by Hiromitsu Asakura