



Spread wins Vertical Farming World Award for the Outstanding Performance of its Next Generation Food Production System, Techno Farm

September 27, 2021

Spread Co., Ltd. (HQ: Kyoto, Japan; CEO: Shinji Inada, hereinafter “Spread”) announced that its next generation food production system *Techno Farm*[™] has won the category of Best Farm Design Innovation at Zenith Global’s Vertical Farming World Awards. Spread was the only Japanese vertical farming company to win an Award this year.

About Vertical Farming World Awards

The Awards were established in 2021 with a goal of celebrating excellence and innovation across the global vertical farming industry, by leading food and drinks consultancy Zenith Global. The Awards comprise of 17 categories, with the winner of each determined by an independent committee of 5 judges, each with extensive knowledge in vertical farming.

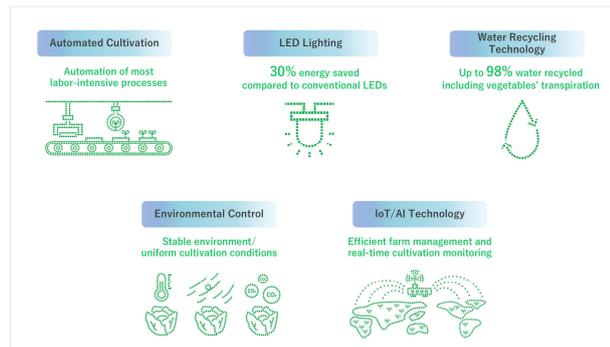
<https://www.zenithglobal.com/events/vfwa2021#details>

Techno Farm[™] wins Best Farm Design Innovation

In addition to innovative concept, the judges were impressed with the stable operating rate of 99% *1 at large-scale automated Techno Farm Keihanna, which implements the system. They highlighted the “Impressive data points and performance metrics from a forerunner in the industry,” and that *Techno Farm*[™] delivers the “Most evidence of improvement presented.”



Certificate



Main technologies of *Techno Farm*TM

Future Developments

As the expectations for vertical farming continue to rise worldwide, Spread plans to deliver a total production capacity of 100 tons per day in Japan by 2030. Spread will continue to pursue further business opportunities through technological innovation in the field of AgriTech, both in Japan and overseas. Spread aims to provide solutions for the global problems of climate change and food security, and the delivery of a truly sustainable society.

*1 Based on the number of harvested lettuce heads, compared to maximum capacity of the farm

ABOUT SPREAD

◆ **Kameoka Plant, the Profitability Pioneer of Vertical Farming**

Capacity : 21,000 heads/2.1t/day

Spread's Kameoka Plant cracked one of the toughest challenges in commercial vertical farming. Since starting operations in 2007, Spread has developed sophisticated environmental control technologies, and significantly improved the overall operational efficiency at the Kameoka Plant.

Together this has brought the operating rate to 97% and enabled Kameoka Plant become profitable for the first time in 2013.



◆ **Techno Farm Keihanna. Stable Production via Innovative Technologies**

Capacity : 30,000heads/3t/day

Started operations in 2018. The first vertical farm to utilize next generation food production system *Techno Farm™*. At the R&D facility attached to the farm, development of the new cultivation techniques, as well as IoT and AI systems is underway. As the mother plant of *Techno Farm™*,

Techno Farm Keihanna will serve as the foundation for the never-ending evolution of new technologies.

Innovative technologies, allowing for simultaneous increase in productivity and environmental sustainability:

- Automated cultivation
- Saving over 16,000 liters of water per day via water recycling
- Advanced environmental control
- Energy saving due to LED lighting, tailored for vertical farming usage
- Upgrade in operational efficiency due to IoT-based management system



◆ **Next Generation Food Production System *Techno Farm™***

Developed by Spread with the help of partner companies, *Techno Farm™* builds on the know-how developed at the Kameoka Plant in more than 10 years of its operation.

Automated cultivation, water recycling and environmental control technologies, specialized LED lighting as well as IoT and AI make for simultaneous increase in productivity and environmental sustainability.

Spread will continue to promote this technology as an essential part of sustainable agriculture.

URL : www.technofarm.com/en



◆ **Over 70 Million Packs Sold in Total**^{*1}.

Vertically Farmed Vegetables Brand *Vegetus*

Under the concept of “Sustainable Vegetable”, *Vegetus* strives to be healthy for both Earth and people. Spread’s current lineup includes 3 unique varieties: crunchy Frilly Lettuce, smooth and sweet Pleated Lettuce, soft yet crispy Fringe Lettuce. Each of these delivers a clean and fresh taste and is rich in beta-carotene.^{*2} *Vegetus* is a favorite of children, easy to prepare and fits into any meal, not only salads or sandwiches.

URL : www.vege-tus.com (Japanese only)



◆ **Contribution to the United Nations’ Sustainable Development Goals**



Examples of Spread’s contribution

- Goal 2: Promotion of sustainable food production
- Goal 3: Preventing food poisoning risk via hygiene and cultivation management practices
- Goal 8: Labor saving through automation and digital transformation
- Goal 9: IoT-based management system for efficient cultivation
- Goal 12: Helping to reduce food loss and waste
- Goal 13: Promoting resilient agriculture
- Goal 15: Efficient usage of land resources and pesticide-free cultivation
- Goal 17: *Techno Farm*TM partnership business

*1 Actual numbers of lettuce, produced and sold by Spread

*2 *Vegetus* clears Japanese Ministry of Health, Labor and Welfare standards for the “beta-carotene rich” vegetables (equal or more than 600µg/100g)

[Contact information]

Spread Co., Ltd. Corporate Communication Department

E-mail : info@spread.co.jp

URL : www.spread.co.jp/en