Research article

Theme-Community Based Adaptation Strategies Toward Sustainable Rural Development: Case from a Local Tofu Company in Saitama Prefecture, Japan

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Abstract There are several past researches conducted on "theme-community" wherein the initiatives and/or relationship among stakeholders focus on a certain product or concept regardless of traditional political boundaries. This paper focuses on tofu or its raw material, soybean. Tofu is one of the main soybean processed products and an integral part of a traditional meal in Japan. Although the amount of its domestic production and consumption have only changed slightly, the number of tofu companies have been drastically decreased from 50,000 in 1960 to 8,000 in 2014. This can be attributed to the inability of small-scale tofu companies to compete with prevalent mass production of large-scale processing companies, and to respond to the demand of supermarkets for much lower retail price. In order to provide possible ways to gain resiliency for local small-scale companies, this study aims to determine the adaptation strategies of a local tofu company in Saitama Prefecture, Japan using the case study approach. Company visits and key informant interviews revealed that the local tofu company conducted (1) product development in accordance with season, farming community and consumer demand, (2) introduction of TEIKEI for soybean farmers, and (3) implementation of innovative selling activities. Moreover, these initiatives further paved way for sustainable rural development. For further study, there is a need to determine the development of its partnership with and its respective impact to the local soybean farmers.

Keywords organic farming, soybean, TEIKEI, product development, selling

INTRODUCTION

There are several past researches conducted on "theme-community"¹⁾ wherein the initiatives and/or relationship among stakeholders focus on a certain product or concept regardless of traditional political boundaries. This paper focuses on tofu or its raw material, soybean. Tofu is one of the main soybean processed products and an integral part of a traditional meal in Japan. Although the amount of its domestic production and consumption have only changed slightly, the number of tofu companies have drastically decreased from 50,000 in 1960 to 8,000 in 2014 (Zentoren, 2017). This can be attributed to the inability of small-scale tofu companies to compete with prevalent mass production of large-scale processing companies, and to respond to the demand of supermarkets for much lower retail price.

In order to provide possible ways to gain resiliency²⁾ for local small-scale companies, this study aims to determine the adaptation strategies of a local tofu company (thereafter, LTC) in Saitama Prefecture, Japan using the case study approach.

METHODOLOGY

This study utilized the case study approach using both qualitative and quantitative data. This focuses on the experiences of LTC operating in Tokigawa, Saitama Prefecture, Japan since 1946. Tokigawa Town, which is located North-West of Tokyo, has a land size of 55.9 sq. km. and population of 11,488 persons (TOT, 2017). Primary data were gathered from company visits and key-informant interviews with President W (thereafter, PW) conducted in June and December 2015, and November 2016. Gathered information included company profile and vision, company development, relationship with other stakeholders, usage of locally-grown soybeans to name a few. Moreover, preliminary and additional information were also gathered from the special lectures given by PW about his tofu company during the Shimosato Farm Tour³ in May 2015 and 2016, respectively.

RESULTS AND DISCUSSION

Profile of LTC

Table 1 shows the highlights on how LTC developed as a company, which was initially established as a family-managed konnyaku (jelly-like cake made from konnyaku flour) store by the founder (father of PW) in 1946. Since konnyaku showed to be unsellable during summer, the family also engaged in tofu business in 1951. Selling activities was mainly conducted by peddling in 1955, and expanded to wholesale selling to local stores of food, vegetables and/or fish in 1965. PW took over the business in 1979 when he realized that the founder was heavily affected by the passing of his mother. This was also the time when PW, as then college graduate, gave up his dream to be an accountant.

Table 1 Highlights on the Development of LTC

| Year | Events | | | | | |
|--|--|--|--|--|--|--|
| 1946 | Founder (Father of the current president) established a family-managed konyaku store in | | | | | |
| | Myokaku Village (Presently known as Tokigawa Town) | | | | | |
| 1951 | Engaged in family-managed tofu business | | | | | |
| 1955 | Mainly sold tofu by peddling | | | | | |
| 1965 | Started wholesale selling tofu in local stores of food, vegetable and/or fish | | | | | |
| 1979 | Mother of PW passed away | | | | | |
| | Took over the business from founder | | | | | |
| | Shifted to retail selling at supermarkets as main channel | | | | | |
| 1985 | Experienced business challenges due to extreme price competition among supermarkets | | | | | |
| 1992 | O2 Started construction for tofu factory expansion | | | | | |
| | Secured parking lots for three (3) delivery vans | | | | | |
| 1993 | Met with organic farmers and consumers who prefer organic / natural produce | | | | | |
| 1997 | Shifted to direct store selling with "Territorial Development with Cultural Identity" as a | | | | | |
| | management policy | | | | | |
| 2002 Started being supplied by local farmers from Hatoyama Town, followed by Ogawa T | | | | | | |
| | Made improvements in the main store | | | | | |
| 2003 | Converted family business to a limited company (LTC) with 10 million yen capital | | | | | |
| 2004 | 14 Founder passed away | | | | | |
| | Received the Saitama Governor Award for Agriculture and Forestry Division specifically for its | | | | | |
| 2005 | local production-local consumption initiatives | | | | | |
| | Moved the main store to new location for establishment of disposal facility and expansion of | | | | | |
| | parking space, and improvement of production/selling operations | | | | | |
| | Received the Minister of Agriculture, Forestry and Fisheries Prize as the Best Food Retail Store | | | | | |
| 2006 | (National Competition) | | | | | |
| 2007 | Reached 340 million yen in sales | | | | | |
| 2012 | Received The Mainichi Newspaper Agriculture Record Award | | | | | |
| | Started mobile store | | | | | |

Source: Key-Informant Interviews, June 2015, December 2015 and November 2016.

In the early 1980s, most tofu companies were mainly dependent on supermarkets as main channel. However, the price competition among supermarkets became extreme in 1985. Supermarkets lowered the price from 80 yen per to 30 yen (US\$1 = 119.49 yen, Mitsui Sumitomo Bank, 1 December 2017) per pack to attract more customers. However, this resulted to great financial burden for tofu companies, including LTC. In PWs search for other business options, PW had the opportunity to start exchanging ideas with organic farmers (including Mr. Kaneko of Shimosato Farm, pioneer organic farmer in Ogawa Town, Saitama) and consumers who prefer organic/natural produce in various study groups and events since 1993. By 1997, PW reformulated its management policy to a company focusing on Territorial Development with Cultural Identity. Specifically, PW "believes that safe and good quality foods are made based on good human relationships. Thus, the store will continue to keep promises to the society and to serve as the bridge for local farmers and consumers brought together by tofu making." In order words, connectedness with and among local farmers, customers, employees and other stakeholders are significantly valued. In the same year, transactions with local farmers from Hatoyama and Ogawa Towns were initiated.

In order to fulfill the management policy, improvements were made in the main store and PW converted family business to a limited company in 2002, then the store moved to the current location in 2005 to improve its production and selling operations, and its service to valued customers.

Currently, LTC employs about 50 persons, including part-time, mostly residing within 15 km away from the store, conveying that LTC also supports local employment. In addition to its own local produce for local consumers, it also supports local farmers by allocating a corner at its store for local vegetable, flowers and other local products. Since 2006, the annual company sales have been more than 300 million yen.

In recognition to LTCs various efforts and initiatives, PW has received various awards such as Saitama Governor Award (2004), Minister of Agriculture, Forestry and Fisheries Prize as the Best Food Retail Store (2005) and The Mainichi Newspaper Agriculture Record Award (2007).

Adaptation Strategies

Soybean-based TEIKEI: In order for LTC to offer various tofu products made from locallyproduced soybeans, LTC gives value and support to its soybean farmers through TEIKEI system. LTC president first heard about TEIKEI⁴⁾ (Producer-consumer co-partnership that is not limited to buying-selling transaction) from Mr. Kaneko of Shimosato Farm and wanted to make a Soybean-Based TEIKEI. Currently, LTC's basic policy in purchasing soybeans are (1) price is set at a point wherein farmers can sustain its operations and replant for next season; (2) all harvested soybeans are purchased; and (3) all payments are made in cash only.

| Location | Soybean variety (kg) | | | | Total | |
|--------------------------|--------------------------------|-------------------|------------|-----------------|-------------------|---------|
| - | Aoyama Zairai ²⁾ | Miyagi Shiromi | Sato Irazu | Shakin Nashi | Tanba Kuromame | |
| Kumagawa City | 48,383 | 0 | 0 | 360 | 138 | 48,743 |
| Ranzan Town | 0 | 4,350 | 9,900 | 2,730 | 0 | 16,980 |
| Ogawa Town ³⁾ | 13,590 | 0 | 0 | 0 | 0 | 13,590 |
| Kawagoe City | 7,320 | 0 | 6,240 | 0 | 0 | 13,560 |
| Hatoyama Town | 9,730 | 0 | 0 | 0 | 0 | 9,430 |
| Total | 79,023 | 4,350 | 16,140 | 3,090 | 138 | 102,603 |

Table 2 Local Soybean Supply of LTC by Location and Variety, 2014¹⁾

Source: Key-Informant Interview, December 2015.

1) In terms of size, LTC had been supplied with extra-large, large, medium and small sizes of soybean. Large sized soybeans accounted for 95% of the total supply.

2) Aoyama Zairai accounted for 77% of total supply.

3) Ogawa Town farmers supplied organically-grown (yuuki saibai) or specially cultivated (tokubetsu saibai) soybean. Organically-grown soybeans accounted for 38% of total supply from Ogawa farmers. Table 2 shows local soybean supply of LTC by location and variety in 2014 with a total supply of 102,603 kg. There were five (5) varieties of soybean namely *Aoyama Zairai*, *Miyagi Shiromi*, *Sato Irazu*, *Shakin Nashi* and *Tanba Kuromame*. Among them, *Aoyama Zairai* accounted for 77% of total soybean, followed by *Sato Irazu* (16,140 kg).

In terms of location, Kumagaya City supplied the highest volume, amounting to 48,743 kg (47% of total supply), followed by Ranzan Town (16,980 kg) and Ogawa Town (13,590 kg). It should be noted that Ogawa Town supplied organically-grown (yuuki saibai) and specially cultivated (tokubetsu saibai) soybean. Organically-grown soybeans accounted for 38% of total supply from Ogawa Town. In order to further promote local brands, LTC also offers special products made from certain farms, locations or varieties (e.g. Shimosato Series). Although the soybean supply fluctuates every year, volume supplied by Ogawa farmers has been increasing from 6,590 kg in 2011 to 13,590 kg in 2014.

Product development: LTC sells a total of 100 products, of which own brand accounts for about 30-50 soybean products including special products for winter and summer seasons. It also offers special local products by soybean variety (e.g. sato irazu momen tofu, sato irazu nigari tofu) and location/farmer (e.g. Shimosato tofu series, Hatoyama natto, Shimosato natto). Jimoto no daizu de tsukutta tofu is made from locally soybean produced within a 3km radius from the store. Since Japanese also have the tradition to give/send presents (e.g. mid-year gift, year-end gift) to family, friends and/or colleagues, gift sets (e.g. Tokigawa set, Organic Set by Shimosato) are also made available. In order words, LTC offers a wide-range of products.

Table 3 shows the top 10 most saleable products in 2014. According to PW, June and February are the peak and low months, respectively. Except for tofu purin (tofu flan), all listed products are LTC brand. All-year round favorites are okara donuts (donuts made from tofu leftovers), agebo (fried tofu bar) and renkon ganmo (fried tofu with lotus root). The top 10 most saleable products accounted for 42% and 40% of the total sale in June and February, respectively.

| Rank | Peak Month (June) | Low Month (February) |
|------|--------------------------------|---------------------------|
| 1 | Okara Donuts (5-pc. pack) | Okara Donuts (5-pc. pack) |
| 2 | Agebo (1 pack) | Agebo (1 pack) |
| 3 | Renkon Ganmo (1 pack) | Tokigawa Tokyo Kata |
| 4 | Tokigawa Tokyo Kata | Onsen Yu Tofu |
| 5 | Kyo Nigari Shimosato | Renkon Ganmo (1 pack) |
| 6 | Shiro Zaru Tofu | Teage Aburaage (1 pack) |
| 7 | Nagoshi Tofu | Kyo Nigari Shimosato |
| 8 | <i>Teage Aburaage</i> (1 pack) | Fuwafuwa Atsuage (3 pcs) |
| 9 | Kurogoma Tofu | Shiro Zaru Tofu |
| 10 | Tofu Purin ²⁾ | Fuwafuwa Namaage (3 pcs) |

 Table 3 Top 10 Most Saleable Products of LTC by Peak and Low Months, 2014¹⁾

Source: Key-Informant Interview, December 2015.

1) LTC sells about 100 products every day, of which LTC brand accounts for about 30-50 products.

2) Among the top 10 most saleable products for both months, all products are own brand products except for tofu purin.

3) Top 10 most saleable products accounted for 42% and 40% of the total sale in June and February, respectively.

Innovative selling strategies: As mentioned earlier, LTC's selling method has continuously and proactively evolved from peddling (1955) to wholesale selling in to local food stores (1965) to retail selling in at supermarkets (1979) to direct store selling (1997-present), in response to the changing business environment. Moreover, it also organizes events (e.g. monthly Tofu Marche, instore tofu tasting) as part of their promotion activities. The tofu processing area is also made available to customers who can view through in-store glass windows. In this way, not only the transparency of tofu making can be achieved, but also the connectedness between employees (who directly make the tofu) and customers can be spontaneously created. As a result of these initiatives,

LTC has about 400 customers in weekdays and 800 customers in weekends during summer season, while 300 customers in weekdays and 600 customers in weekends from October to March.

However, PW emphasized that the store has reached its peak in terms of sale and customer reach. Therefore, LTC has started its mobile store in 2012, which has further expanded its potential market (e.g. aging population and/or those who do not have cars to directly buy in the store). Currently, there are 3 mobile stores that offer freshly-made soybean products to customers in nearby Hatoyama Town, Ranzan Town, Higashi Matsuyama City and Sakado City following a weekly schedule.

CONCLUSION

Company visits and key informant interviews revealed that the local tofu LTC conducted (1) product development in accordance with season, farming community and consumer demand, (2) introduction of TEIKEI for soybean farmers, and (3) implementation of innovative selling activities to name a few. Moreover, these initiatives further paved way for sustainable rural development. For further study, there is a need to determine the development of its partnership with and its respective impact to the local soybean farmers.

NOTES

- 1) Shimoguchi and Inaizumi (2016) clarifies the relationship of a farmer and other spontaneous "organic" peers (e.g. local tofu maker) through organic farming/products. Shimoguchi (2015) explains how two Philippine provinces in the same island, however, separated by political boundaries, language and environmental conditions (e.g. mountain) sign an agreement to establish the Negros Island as the "Organic Island in Asia" towards their mutual and sustainable growth and development.
- 2) Milestad & Darnhofer (2003) explains that resiliency can be achieved by continuously learn and adapt to changing environment.
- 3) Shimoguchi et al. (2015) explains that Shimosato Farm offers farm tour six (6) times a year. Each tour includes two (2) lectures and tour around the farm. One lecture is given by Mr. Kaneko, organic pioneer and farmer in Ogawa Town, Saitama, and another lecture by his collaborators such as Reform Company for Community Supported Agriculture (CSA)-related to rice and Tofu Company for soybean.
- 4) Orito (2014) explains the TEIKEI experience of Shimosato Farm. In addition to stipulating the 10 principles of TEIKEI, JOAA (1978) explains that "TEIKEI is an idea to create an alternative distribution system, not depending on the conventional market. Though the forms of "teikei" vary, it is basically a direct distribution system. To carry it out, the producer(s) and the consumer(s) have talks and contact to deepen their mutual understanding: both of them provide labor and capital to support their own delivery system...... The Japanese organic agriculture movement started with this "teikei" system. "Teikei" is not only a practical idea but also a dynamic philosophy to make people think of a better way of life either as a producer or as a consumer through their interaction".

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