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Trust and Food Modernity in Vietnam

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Introduction

Studies conducted in European countries (Eurobarometer 2006) have shown a growing anxiety generated by food among consumers. Sociologists, as mentioned later, have analysed the reasons for this trend. One set of reasons is related to the changing nature of risks making these risks less acceptable for eaters: risks are noncontrollable, new, unknown, controversial, with few benefits for eaters (Slovic 1987). Another set is related to the industrialization and globalization of food systems and, as a consequence, the growing physical and cognitive distance between eaters and food (Bricas 1993). Other reasons are related to changing and oftentimes nontransparent relations between the stakeholders of the food

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systems (producers, food industries, traders, consumers, state agencies, experts, all suspected to privilege their own interests over food quality) and their impacts on the process of trust building between consumers and their food, in particular in relation with safety issues (Poulain 2012; Fischler 1990). These changes, characteristic for the food sector, have been called alternately second modernity, late modernity (Fonte 2002), or hypermodernity (Ascher 2005).

In a context of emerging economies like those found in Asia, the rapidity of processes such as industrialization, urbanization, and economic liberalization causes the development of first modernity and the transition to a second one to be almost simultaneous, resulting in a “compressed modernity” (Beck and Grande 2010; Kyung-Sup 2010). Even if we consider that there is not a linear transition from first to second modernity (Beck and Lau 2005), we can admit an overlap of both modernities where individuals navigate from one world of meanings to another, or combine and mix eclectic features from both worlds. What then is the impact on food anxiety?

We propose in this chapter to describe these developments in the context of Vietnam. The food sector in Vietnam is undergoing sweeping changes: end of shortages, development of an agri-food sector, and supermarket distribution. These changes come about through the impact of the combined forces of rapid economic liberalization, urbanization, improved living standard of the people, and the transformation of social and cultural norms. Households are seeing a diversification of the products consumed and changes in consumption practices: their own production of food decreases both in urban and rural contexts. (The self-consumption decreases with the urbanization process and the specialization of farms (Moustier et al. 2003)) as well as the preparation with the increasing consumption of processed food and the development of out-of-home consumption (Ehlert 2016). We hypothesize that these changes are not just a shift imposed by globalization, from traditional to modern, or from local to global food systems, but that they are also driven by the stakeholders of the food systems who mix elements from the traditional food system (see below) as well as from different stages of modernity; these changes can be analysed through the evolution of consumers’ concerns towards their food.

Our purpose in this chapter is to analyse the modernization of the Vietnamese urban food system, its impact on food anxiety and on the way for consumers to build trust in their food, and to recognize it as edible. This analysis relies on data originating from different studies (see Table 5.1)¹ conducted over nearly 15 years through the framework of MALICA,² a France-Vietnam research consortium (French Agricultural Research Centre for International Development (CIRAD), Vietnam Academy of Agricultural Sciences (VAAS), Institute of Policy and Strategy for Agriculture and Rural Development (IPSARD)). Given the many facets of the food issues tackled in those studies, many different methods have been required to collect data (person-to-person questionnaires, qualitative and quantitative surveys, focus group discussions, and free

Table 5.1 List of the consumers' surveys conducted by the MALICA consortium and quoted in this chapter

Surveys/Projects	Date	Main topic	Sampling	Methodology
S1. CIRAD/IOS (Figuié et al. 2004)	2002	Relation between food/health	200 households in Hà Nội 40 households in Mông Phu	Semi-structured questionnaires
S2. Susper (Figuié 2007)	2003	Trust in vegetables' quality and labelling	55 consumers and 4 focus groups of 10 consumers	Free listing and focus group discussion
S3. Markets4poor (Moustier et al. 2006; Figuié and Moustier 2009)	2005	Food purchasing practices	100 low-income households in Quỳnh Mai area, Hà Nội	One week monitoring
S4. ACI project (Figuié and Mayer 2010)	2006	Trust in food labelling and retailing points	537 households in Hà Nội	30 in-depth interviews 507 structured interviews
S5. ANR SustainApple (Nguyen Thi Tan Loc et al. 2016; Moustier et al. 2014)	2014	Perception of apple quality in relation with their origin Apple market chain	54 consumers in Hà Nội and 49 in Hải Dương, on 6 focus groups 25 retailers and 34 wholesalers of apple in Hà Nội and Hải Dương	Focus group discussions Interviews (39) and in-depth interviews (20)

Source: Authors' own

listing) and to sample surveyed persons (urban and rural households (survey 1 in Hà Nội and Mông Phu), income levels (survey 2 in focus groups), focusing on poor households and their foodscape (survey 3 in Quỳnh Mai district, in Hà Nội), customers from different retailing points (survey 4 looking at street markets, official open markets, shops, supermarkets), or stakeholders along the market chain (survey 5 on the apple market chain)).

Men were underrepresented in our surveys: most of these surveys focused on food purchasing and food preparation practices (rather than food consumption), and men in Vietnam are not much involved in these tasks (as food customers or traders). We did not conduct any survey aiming at comparing age groups. Yet we guess from what we collected indirectly that this could have been valuable. We believe that this diversity of surveys, by their objectives, methods, sampling strategies, does not weaken our demonstration but on the contrary provides a comprehensive overview of the changes affecting the Vietnamese food system, from different points of view on its social spaces.

In the first section, the main concepts used for this analysis are exposed: food system, distanciation distanciation and conventions of quality. In the second one, we describe the accelerated modernization of the Vietnamese food system in the last 30 years. In the third, we analyse the impact of this modernization on the strategies of Vietnamese urban consumers to build trust in their food, in particular in relation with food safety issues.

Food Systems, Distanciation, and Quality in the Light of Modernity

Food Systems and Food Modernity

A food system can be defined as “the series of technological and social structures which, from the field to the kitchen, via the various stages of production and processing, enable the food to reach the consumer and to be recognised as edible” (Poulain 2017, 206). A food system is a useful concept to analyse at each stage (including purchasing, cooking, and

eating stages) how stakeholders mobilize knowledge, representations, and social interactions to recognize the quality of their food. It provides a framework to analyse how the eaters at the end of this chain decide to trust their food or not, the technologies embedded in it, the stakeholders involved in its delivery, and how people finally consume it or not. This process may vary according to the different food systems and their respective local embeddedness.

Three different food systems have been identified, in relation with the modernization process (Fonte 2002; Malassis and Padilla 1986): the traditional, the modern, and the late modernity food systems.

In the *traditional food system*, food production relies on numerous and small-scale farming units, involving a high proportion of the population. Production units are also consumption units since self-consumption dominates. The market is limited to local trade of rough products and the proximity between producer and consumer constitutes the basis of trust (Fonte 2002). The system is characterized by its simplicity and frugality. *The modern food system* developed in Western countries through the agricultural industrialization experienced during the twentieth century. In its most advanced phase, it is characterized by a highly specialized, industrial production sector involving a small part of the population. This system enables important growth of production and reduction of food shortages. Self-consumption is low, mass consumption prevailed based on standardized products, a so-called Fordist diet (Friedmann and McMichael 1989). Processed food is provided via the market over long distances and via a large number of specialized actors (Fonte 2002). In addition to these two models (traditional and modern), Fonte (2002) identifies a third model, referred to as the *late modernity system*, which has been emerging since the 1970s. It is a consequence of the crisis of the previous ones in relation with raising issues of sustainability and safety (e.g. the “mad cow” crisis linked to the emergence of a new zoonotic disease, Bovine spongiform encephalopathy—BSE—in the 1980s) and in a context of reflexive modernization that means “the possibility of a creative (self-)destruction for an entire epoch: that of industrial society” (Beck 1994, 2). It is characterized by satiety, compared to the shortages of the traditional model, and growth (in food intake and in food market) of the modern one. Satiety is characterized by a saturation of energy

intake (with an increasing burden of diseases related to obesity, diabetes, hypertension, etc.) and the stabilization of food expenditure over total household expenditure. The industrialization of the food chain is more generalized and includes a preparation stage (households buy processed food). Consumption patterns are more individualized, with consumption outside the home playing an important role. At the same time, traditional techniques are re-evaluated and niche markets develop for fair-trade, organic, local products and the like in order to respond to growing consumer concerns (see Faltmann, this volume).

As Fonte mentioned, the shift from one system to the other does not imply the complete disappearance of the preceding one; different models may co-exist. This “overlap” may be important in countries where the process of modernization is rapid, such as is the case in “compressed modernity” (Kyung-Sup 2010). Each food system is characterized by a dominant consumption model, involving the various stages of purchasing, transporting, storing, cooking, sharing, eating, and managing wastes. Knowledge, representations, and the social interactions that consumers mobilize at each of these stages to recognize food as safe and edible are impacted by the process of modernization. The concept of “distanciation” is useful to understand this impact.

“Distanciation”, a Challenge for the Modern Eater

Urbanization and industrialization contribute to increase the distance between production and consumption, between products and consumers. This process can be summed up by the concept of “distanciation” (Bricas 1993). This “distanciation” process results from the following trends:

- 1) With the development of a food industry, consumers have to be able to distinguish food products within an increasingly diverse choice. At the same time, however, consumers lose knowledge of processes of food production and transformation, which have become complex. It is no longer possible to identify food with a particular place or actor (family, neighbours or known sellers). Food becomes “delocalised” and

loses its identity. Consumers are faced with what Fischler (1990) refers to as an “unidentified edible object” (OCNI—French acronym).

- 2) Although, during modernity, science has proved itself capable of overcoming shortages, in late modernity, science is no longer seen by consumers as a source of progress but as a source of new risks (Beck 1994). These new risks are related to the industrialization of production and transformation processes, for example, pesticide residues, mad cow disease. That means in the words of Giddens (1991) that they are manufactured risks, implying culpability and responsibility rather than random events. Moreover, late modern risks are complex, with time-lag effects, and are referred to as being “invisible”, or out of reach of the senses of the layperson. The consumer can only rely on third parties who act as intermediaries between the consumer and the product and who can guarantee the safety of the product.
- 3) The modernization of the food system is accompanied by a generalization of pre-packed food. Buyers no longer choose among foodstuffs but among packages (Cochoy 2002). Pre-packed food satisfies the needs of transportation, hygiene, self-service, and product identification. Packaging carries new kinds of information: brand, label, information on origin, and so on. However, while pre-packed food can provide buyers with a great deal of information, it also hides certain factors: by preventing direct contact with the foodstuffs, it contributes to depriving the consumers of their capacities for assessing the foodstuffs using their senses (Figué and Bricas 2010).

In this modernization and distancing process there is a shift of consumers’ expertise: it moves away from the knowledge of a product’s intrinsic characteristics towards the analysis of information relating to its brand, label, and point of sale as well as the reliability of this information and those providing it. The qualification process of food is transformed. In the traditional food system qualification relies on direct procedures; these procedures stimulate the sensory capacities of the subject to evaluate the physical characteristics of the product (Bricas 1993).³ With the modernization process of the food system, consumers have to deal with more indirect qualification procedures: trust in food relies increasingly on trust in the numerous stakeholders involved in the food system such as in

science, the food industry, and supermarkets. In the late modernity system, consumers' trust in food cannot longer be taken for granted (de Krom 2010; Kjaernes et al. 2007).

Assessing the Safety of Food: A Matter of Convention

Food safety becomes a major concern for the consumer in a late modern food system. At the same time, the process of food qualification by consumers is transformed. It becomes more indirect. This is even more pronounced in the case of sanitary quality. In late modernity, food risks refer to the presence of pesticide or antibiotic residues, bird flu, and so on. These characteristics cannot be assessed by the consumers themselves (or only in the very long term). They are related to what has been named "credence attributes" (Darby and Karni 1973),⁴ that is, signs that are not connected to the products themselves, but which are more indirect such as a veterinary stamp, a label, or a brand. That raises questions of trust in a third party capable of giving credibility to these signs.

To identify the different ways to build trust in food quality, we can use the grid proposed by Sylvander (1995). It is based on the typology of conventions defined by Boltanski and Thevenot (1991). Sylvander identifies "quality conventions", that is, a set of common beliefs between the purchaser and the seller, making it possible to come to an agreement on the quality of the products and therefore conclude the transaction. He proposes four quality conventions: the market convention where price is a means of indicating quality; the industrial convention in which compliance with a set of specifications built on scientific knowledge, formalized by a label, is the basis for trust in the quality; the domestic convention or interpersonal convention where the consumer's trust is based on a personal relationship with the supplier; and the civic convention where the commitment of an institution guaranteeing the public good, such as the government, also formalized by a label, reduces consumer uncertainty (Sylvander 1995).

In this chapter we analyse the Vietnamese food system and we focus on the purchasing stage. We analyse how Vietnamese urban consumers build trust in purchased food. We propose that the Vietnamese food system is

transformed by a “compressed modernity”. This transformation increases the distance between the food and the consumers. This distance imposes consumers redefining their way to build trust in food, in order to face their growing anxiety towards food safety.

Evolution of the Food System in the Vietnamese Context

The food sector in Vietnam is undergoing sweeping changes under the impact of the combined factors of economic liberalization, urbanization, and the improved living standard of the people. These changes (see Box 5.1) have been initiated with the adoption of *Đổi Mới* policy in 1986 characterized by an economic and political opening. As a consequence, Vietnam’s GDP increased substantially during the past 30 years, from USD 14.1 billion in 1985 to USD 193.6 billion in 2015.⁵ Per capita GDP doubled in seven years to USD 1560 in 2012 (ranked 155th globally). Vietnamese urban middle and upper classes re-emerged, driving consumerism as the number of middle class households has nearly doubled over the past decade from 1.2 million in 2003 to 2.3 million in 2012 (USDA 2008). These changes are coming with important transformations of Vietnam’s food system affecting food markets and food safety (see Ehlert and Faltmann, this volume).

Box 5.1 Prominent Trends That Will Shape the Growth of Vietnam’s Modern Retail Sector over the Next Few Years, According to US Department of Agriculture (USDA 2013)

- A growing number of Western-minded consumers, especially large numbers of young consumers in urban areas.
- A growing middle class, where both parents are working and less time is available for food shopping.
- A high number of women in the workforce, with increased disposable incomes to purchase higher-value food products for their children and families.
- A wide range of products offered by large supermarkets, attracting even lower-income consumers.

- Increasing consumer acceptance of processed and packaged products. Many products traditionally sold in bulk are now readily available pre-packaged.
- More concern about and willingness to pay for nutrition, quality, hygiene, and food safety.
- Brand loyalty, but still receptive to new products.
- Weekly shopping at modern retailers versus daily shopping at traditional markets.

USDA Foreign Agricultural Service, 2013. Vietnam retail foods; Sector report 2013. Gain Report VM 3062. Hanoi, USDA.

A Food System Under Modernization

Until the *Đổi Mới* policy began bearing fruit, food distribution of staples produced locally or sourced from Soviet food, aid was taken care of through a system of ration vouchers, and also through the black market. Since then, the food market in Vietnam experienced sharp growth. In 1992–1993, it accounted for USD 3.4 billion or VND 51,500 billion; excluding the value of out-of-home consumption, not available for that “period”.⁶ Ten years later, that market had almost doubled, accounting for over USD 7.2 billion (VND 91,000 billion, and nearly VND 110,000 billion including out-of-home consumption) (Moustier et al. 2003). A prospective study estimated the Vietnam food and beverage market at USD 66 billion in 2017 (USDA 2008).

This trend reflects a growth in the quantities of food consumed at the individual level, along with a decreasing rate of undernutrition (Tuyen Le Danh et al. 2004) and at national level, both in rural and urban population. It also reflects a decrease in households’ self-consumption, in relation to a growing share of urban population (it grew from 14.5 per cent in 1985 to 30.8 per cent in 2015)⁷ and rural households increasingly depending on markets for their supply (in food and agricultural inputs) and for commercializing their production. This growing food market is mainly to the advantage of local producers despite the rapid increase in imports. In 2001, imports represented only about 6 per cent of the food market in Vietnam compared with 19 per cent in 2006

(USD 0.44 billion and USD 2 billion respectively for the value of imports, according to FAOstat) (Vorley et al. 2015). Food imports mainly originate from China, Australia, and other ASEAN countries (USDA 2008). In Hà Nội metropole, the peri-urban agricultural production meets an important part of the needs of the population with 69 per cent of meat, 32 per cent of fish, 38 per cent of rice, 60 per cent of vegetables, and 18 per cent of fruits produced in this area, according to an official of Hà Nội City department of agriculture (quoted in Vorley et al. 2015).

The growth of agricultural production observed in Vietnam over the past 20 years relies on an intensification of agricultural production, in particular through an increasing use of chemical inputs (fertilizer, pesticides, preservatives, etc.). For example, the use of pesticides has sharply increased in Vietnam during the last years. The volume of imports has increased five times from 1990 to 2007, mainly coming from China, partly relying on a black market where vendors illegally import proscribed pesticides (Pham Van Hoi et al. 2013). Food processing has also been industrialized, as has the retail sector through supermarket development. The modern retail sector accounts for a small share of the distribution system but that sector is growing rapidly: it accounts for 14 per cent of food market share in 2008 (USDA 2008) compared with 5 per cent in 2002 (Figuíe and Moustier 2009). From zero modern grocery outlets in 1990, by 2012 Vietnam had 421 supermarkets, 23 hypermarkets, and 362 convenient stores (USDA 2013).⁸

With this increasing dependence on the market for food supply, the lengthening and industrialization of food chains, and the increasing use of pesticides all contribute to rising food safety issues. Food crisis and food scandals multiply. They can be interpreted as signs of late modernity in the food system.

Food Scandals and Crises As Signs of Late Modernity

The modernization process of the Vietnamese food system operates in a context of a lack of control capacity from authorities. Controls are scarce, and when they exist have a low level of trust given the frequency

of misleading information (Ginhoux 2001). With this lack of official control and information, media are the main source of information for consumers. Most of these media are controlled by the state, and behave as the voice of the leading Communist Party (Kerkvliet 2001). On several occasions, they have revealed and exposed criticisms towards the practices of stakeholders of the food system, like street vendors, or local authorities, for example, regarding the local implementation of state regulation, in the case of avian flu crisis (Tuong Vu 2010; Guénel and Klingberg 2010). Moreover, social media and the internet may facilitate whistle blowers as they did during the measles crisis in 2014,⁹ or function as a “social amplifier of crisis”.

The *phở* crisis is a good example of that situation. *Phở* is a culinary specialty of Hà Nội; consumed at any time of the day (see Peters, this volume). This is a beef broth poured over strips of beef and rice noodles, fragrant star anise, and ginger. In 1999, controls made in various street restaurants revealed the presence of formaldehyde in seven samples out of ten. Formaldehyde is toxic to humans. It is used to preserve noodles and keep them soft.

These revelation by the press (*Nhân Dân*, 6 Jan. 2000) caused what has been called “*phở* crisis”. In the days that followed, *phở* consumption fell by up to 80 per cent. After this, consumers progressively resumed their consumption habits.

The use of formaldehyde is probably not new. What is new is the role of the press in the uncovering the massive scale of formaldehyde contamination, and the way to interpret it. Using formaldehyde was characterized as a serious crime against the national gastronomic culture, a crime motivated by the pursuit of profit by a few individuals at the expense of the general interest. Indirectly, the criticisms point out that economic liberalization adopted in 1986 has allowed private entrepreneurship and capitalist values to develop. A similar interpretation can be applied to the revelation by the press of mass food poisoning affecting workers employed by foreign companies in Vietnam as a consequence of these reforms.

The *phở* crisis may be the first food scandal of the second modernity: a scandal largely mediatized, affecting consumers’ behaviours massively, but with no (registered) victims. It illustrates a crisis in trust between consumers and the other stakeholders of the food system (sellers,

authorities, etc.). The press also regularly reports cases of mass poisoning. For example, during the first four months of 2007, the journal *Thanh Niên News* reported a case of 1000 workers suffering food poisoning after eating at their company canteen, 250 workers the following month, and then 172 school children affected in April at their school cafeteria. They have played up the results of alarming analyses, such as in June 2006, when it was revealed that 30 per cent of pork meat sold contained clenbuterol, a prohibited antibiotic. In 2007, in Ho Chi Minh City, one quarter of the rice noodles sampled was said to contain borax or formaldehyde (like during the *phở* crisis). That same year, the press (*Nhân Dân*, March 2007) alerted consumers regarding problems with water morning glory—the most widely consumed vegetable in Vietnam—produced in Hà Nội's Thanh Tri district. It was found to have heavy metal contamination, causing a severe drop in its consumption. Examples of fraud and counterfeit products are numerous. For example, reconstituted powdered milk was sold as fresh milk (Vietnamnet 2014), or imported milk from China which was adulterated with melamine in 2008. The press also contributes to report certain stories that are more a matter of rumour: hormones in meat reportedly leading to homosexual behaviour or artificial eggs (again, from China) sold in the markets.

Apple safety is one of the recent subjects for Vietnamese consumer concerns (Nguyen Thi Tan Loc et al. 2016). It also illustrates the characteristics of a food scandal of the second modernity. In 2012, media reported that Chinese farmers from Yantai prefecture used prohibited toxic pesticides (Tuzet, Asomate) and arsenical fungicide to coat bags for apples (see Box 5.2). China is the main country of imports of apples in Vietnam and Vietnamese consumption of Chinese apples has been deeply affected by this revelation. Media headlined the issue of “toxic apples”,¹⁰ “toxic Chinese fruits”,¹¹ and “Chinese low quality and toxic products”.¹² Despite the problem being localized to one Chinese prefecture, it affected the trust in all apples, all fruits, and then all products imported from China in a context of a general mistrust in food coming from this country (see Box 5.2). It remained even after the announcement that the company which disseminated the toxic bags was sanctioned. As a consequence, imports of Chinese apples to Vietnam decreased strongly from 162,848 tons in 2009 to 83,623 tons in 2011 and 81,556 tons in 2013 (to the

benefit of imports from USA and New Zealand) (Nguyen Thi Tan Loc et al. 2016).

These food scandals at times come along with massive environmental pollutions provoked by industries, such as the pollution provoked in 2016 by a Taiwanese company, Formosa, set up in Vietnam, at the origin of a massive sea pollution, leading to high fish mortality and protest marches in Hà Nội (Mullman 2016).

No sooner than the Vietnamese modern agro-industrial sector emerges, than it already shows characteristics of late modernity such as large-scale food scandals associated with new technologies (hormones, pesticides, etc.) or the influential role of media in the food system. What are the reactions and the practices of Vietnamese consumers facing these scandals and uncertainties?

Box 5.2 “Toxic Chinese Apple”, the Socio-cultural Dimension of Food Anxiety

Fruits are largely consumed in Vietnam (citrus, banana, apples, litchi, watermelon, guava) (Figuié 2004). They are not only food, they also have symbolic functions, being used as presents for ancestor worship (the 1st and 15th days of the lunar month) or for festive meals (weddings, mournings, festivals, etc.). Fuji apples originating from China, are traditionally popular in Vietnam (Nguyen Thi Tan Loc et al. 2016). They have beautiful brightness, a glossy shell, a crunchy flavour, and they are cheap.

Nevertheless, there is a growing concern about the use of chemicals for fruit production and conservation (S5, S6). This concern was expressed by half of the people surveyed in Hà Nội in 2004 (S1). Following the Chinese apple scandal in 2012, 100 per cent of people surveyed in Hà Nội expressed their concern about chemical residue in Chinese apples (and 67 per cent of consumers in Hai Duong), (S5). This concern is fed by media reports but also originates from a direct experience: many consumers report experiences of conserving apples at home for weeks or even months as a proof of the massive use of chemical conservatives.

The head of the Hà Nội Plant Protection Department announced recently (2016)¹³ that local authorities strictly control the majority of Chinese fruits imported to Vietnam, including control of pesticide residues and preservatives. He mentioned recent samplings of Chinese apples, with 30 per cent of samples containing pesticide residues, but under the allowable level.

Nevertheless, consumers remain anxious and many of them declared that they avoid buying apples from China (which is confirmed by the drop in

Chinese imports of apple): “We do not believe in the quality of (Chinese) apples, so that we do not buy them. Although they are stickered by stamps and labels of exporters, we think that they use more preservatives or these stamps and labels are fake” (focus group in 2014). Sixty-five per cent (S5) declare that they would not buy organic Chinese apples if made available, for lack of trust.

Some consumers report that they prefer buying apples with a sticker indicating a US or New Zealand origin (indeed fruit imports from the USA and New Zealand have increased in recent years). That said, avoiding Chinese apple is not easy since consumers lack reliable information on the origin of the products they buy: “When purchasing imported apples, we do not care about stamps and labels stuck on these products ... because we do not trust them. We only trust sellers because they are familiar and they would not lie with us” (S5).

Distrust in Chinese apples is embedded in a complex relationship between China and Vietnam. It is reported that China supplies the Vietnamese market with all of the low-quality goods that it cannot dispose of on its own market, despite it being considered quite lax in terms of health regulations (see Zhang, this volume). It is noteworthy that the same distrust is expressed by Cambodian consumers with regard to products from Vietnam (Sipana and Moustier 2004). Chinese products are associated with many evils (low quality, counterfeit, poisoned food, etc.) probably echoing thousands of years of rivalry between the two countries. And this instance of distrust may be interpreted as the desire to emphasize one’s identity, as “you are what you eat” as would have said Brillat-Savarin.¹⁴

Trust in Food in Vietnam

Food Anxiety Among Consumers

Changes in the Vietnamese food system have affected the representation of food, in particular in relation with health.

Traditionally in Asia (Blanchon 1995; Simoons 1991), eating is perceived as a way to prevent or cure certain diseases. Foods are seen to fit into three categories—cold, hot, or neutral. The individual must consume the proper combination of each of type to ensure the right balance of the two vital body strengths—yin and yang. Such a classification is not specific to Asia although it exists only residually and latently in Western societies in the form of dishes such as the pairing of cantaloupe and Port

wine (Flandrin 1992). In Vietnam, among the elderly, it is still the basic rule in deciding what food combination to choose. Younger people, although knowing the principle, rarely know how to put foods into those categories (Lepiller 2005). Regardless, a survey conducted in Hà Nội (S1, Table 5.1) shows that for a very great majority (86 per cent), diet is vital for health. While Asian tradition holds that diet is indeed considered as a way of maintaining good health, or even as therapeutic, what seems new is the perception of the dark side of the diet/health relationship: food can also make one sick. Consumers in Hà Nội (93 per cent of them) (S4) feel that the quality of their meals has improved over the last ten years (food is considered to be more abundant and more varied). But over half of the persons surveyed felt that food product quality had regressed. So much so that 65 per cent of them claim that food products today are unsafe for the health.

Consumer concerns involve the nutritional quality of the food. Some foods have recently acquired a sharply negative nutritional image with urban consumers (S1): sugar is associated with being overweight and diabetes. Yet, just a few years ago, there was a striking image of it as a fortifier, with many street vendors selling it in front of hospitals to families who had come to visit sick relatives. The same is true with animal fats and, to a lesser extent, meat, the consumption of which is associated with the emergence of being overweight, obesity, unhealthy cholesterol levels, and high blood pressure (S1).

The main concern, however, relates to the use of artificial chemicals and their residues present in vegetables, fruit, meats, and fish, a concern confirmed by many different surveys (S1–S6). It indicates a pronounced “chemophobia”¹⁵ among consumers. Regarding meat, the main concern involves the use of *lợn tăng trọng* or stimulants (a rather vague term used by consumers, seemingly to refer to antibiotics, hormones, and other growth-promoting agents used in pork feeds). Fish and other aquatic products (shrimp, crab) are also seen as potentially unsafe products because of the use of preservatives (urea, formaldehyde, borax). For fruit and vegetables, the probable presence of pesticide residues is highlighted. Regarding fruit (mainly for those from China), the use of preservatives adds to this problem as mentioned above. Data measuring presence of chemical residues in foodstuffs are scarce (see section “see above”) but

indicate that chemophobia is not baseless. Nevertheless, consumers of course keep on purchasing, cooking, eating, and sharing food. What knowledge, representations, and social interactions do they mobilize to recognize food as being edible in such a context? As shown below, consumers have numerous ways to build trust in food; these ways change with the modernization of the food system.

Building Trust in the Vietnamese Food System

In spite of the dangers associated with the main foodstuffs, consumers are not concerned when they eat at home (S1). Most of them think that the meals they prepare themselves present little or no danger. The home is considered a safe place¹⁶ (see Kurfürst, this volume). To justify their answers (low risk of getting sick when eating at home despite numerous dangers associated to foodstuffs), consumers evoke their knowhow (S1, S2). This knowledge deals with their method of preparing food at home. This presupposes ways of making foodstuffs safe to eat by soaking, washing, peeling vegetables, and prolonged cooking of meat. These practices aim at eliminating impurity, including chemical residues, and to reduce the food related risks at short term (such as food intoxications) and at long term (such as cancer). It deals also and overall with their way of selecting foods at retailing places. This selection relies on direct qualification procedures but also on diverse conventions of quality.

Food Selection in Traditional Markets

The “traditional” sector very much predominates in fresh food distribution. According to Wertheim-Heck et al. (2014), supermarkets in Hà Nội account for less than 2 per cent of the vegetable market. People in charge of purchasing food for households (mainly women), of all social backgrounds, purchase their food daily at open-air markets in order to be sure of the freshness of the produce (S2, S3, S4). The freshness of products is by far the first guarantee of safety. It is also associated with the sensory quality of food such as its taste and firmness.

Buyers purchase food preferably early in the morning (from 6 a.m.) in order to find the freshest products (Figuié et al. 2004). Selecting food may involve a whole set of tests that engage the senses. Consumers in a hurry, sometimes without even getting off their motorbike (the most widespread urban form of transport), head straight for their usual vendor with whom they exchange only a few words. Others go from stall to stall, compare products, touch them, smell them, or even taste them.

Traditional open-air markets offer a wide range of small animals, fish, poultry, rabbits, frogs, that consumers can buy alive; and the word (*sống*) can serve to express that a “food” is raw or that it is living (e.g. alive fish). Larger animals, such as pigs (pork meat is the most consumed meat in Vietnam) are slaughtered in the night in slaughterhouses located in the city (but that the authorities are increasingly trying to move to the outskirts) and are offered for sale on market stalls in the following hours. To assess the freshness of pork meat, buyers smell the meat or touch it to check if it doesn’t stick to your finger (Figuié et al. 2004). It should not be cold which would mean that it has been stored cool so that the animal would not come directly from the slaughtering house. So whereas in French the word “fresh” means both “newly produced, yet unaltered” and “slightly cold”, the Vietnamese language distinguishes these two feels (*tuôi* meaning newly produced and *mát* meaning slightly cold).

Besides freshness, buying at the usual retailers is also a way to guarantee the quality of a food purchase. “I trust the quality of the vegetables I buy because my seller is a member of the Party”, one elderly lady declared (S2). But for the most part, domestic convention has the upper hand through reference to the “woman I usually buy from”. Faithfulness to the purchaser is the counterpart of the seller’s honesty.

Changes in the food market have limited the possibility of direct qualification of the product using the senses because of pre-packaging and the complexity of modern food attributes. Consumers must use indirect qualification where different conventions can be used. At the same time liberalization of the market has eroded the civic convention as the basis of trust. Supply practices are changing, and other ways of building trust are now developing, with the emergence of supermarkets.

Of course, the idea is not for consumers to idealize the quality and in particular the safety of foods previously available in the market. Older

people relate, for instance, that in times of shortage (occurring up into the 1980s), wheat (shipped in from the USSR) and rice had a high proportion of weevils, stones, and other impurities (S1). Although there was probably a risk also present, it was somehow more “acceptable”. Firstly because of the context, namely war and shortages. Moreover, the respondents felt that today’s problems are completely different in nature, linked to the fraudulent practices of economic actors selfishly out for personal gain to the detriment of the common interest.

Anxiety may also be related to increasing offers of products that were still unknown to Vietnamese consumers only ten years ago (sweet products, oil, etc.), pre-packed (conserves, frozen food, etc.) and originating in distant countries (e.g. French products in Cora supermarkets). Although legislation requires that essential information indicated on packaging such as the list of ingredients, expiry date, and so on, be translated, many products continue to break this rule.

Supermarket Development, a New Qualification Process

With the development of a modern retail sector, and in particular the development of supermarkets, the qualification process is changing rapidly. The supermarket is a sanitized, cold, and impersonal place. Freshness does not mean that the product was recently harvested but that it is stored in a cold chain with an “expiration date”. Most of the products are sold pre-packaged or served by gloved employees. The direct contact with the products is broken. The staff of vendors there is often renewed, preventing the creation of relations of familiarity. The buyer needs to redefine how to check quality and to delegate the assessment of food quality to a trusted third party.

Nevertheless, supermarkets are viewed favourably by consumers who trust the quality of the products sold in them, particularly their health quality. Recent crises, such as the avian flu crisis and the influx of buyers to the supermarkets during this crisis (Figuié and Fournier 2008), showed that supermarkets were able to give trust to consumers. That trust is associated with the high prices charged in supermarkets: “In supermarkets, products cost more. So we trust them more” (S3), referring to a market convention. That is also the industrial convention applied to brand name

or reputable products: “Supermarket products are more reliable because maintaining prestige is an issue” (S3).

This analysis shows the diversity and the evolution of trust strategies mobilized by Vietnamese urban consumers when purchasing food.

Despite mistrust in the food system’s industrialization process, linked to a growing chemophobia, trust in supermarkets is high (Figuié and Mayer 2010). It refers to both an industrial convention (trust in brand) and a market convention (trust in the high prices at the supermarkets). It is likely however that an excessive trust is granted to supermarket quality, even if food safety is not objectively always better than in wet markets,¹⁷ and even by those who cannot afford to purchase food there, and then have no experience of it (Figuié and Mayer 2010). Vietnamese policy makers rely on supermarket development to improve food safety and deliver food safety guarantees (Wertheim-Heck et al. 2015). Incidents like the bird flu outbreak in 2005 caused consumer chicken and egg purchases to increase in supermarkets due to Ministry of Health statements recommending that purchases be made at supermarkets where poultry products were considered safe (Figuié and Fournier 2008). This delegation by a Communist government of the protection of its citizens to capitalist companies¹⁸ may be surprising. Delegating management of a health risk to the supermarket distribution sector in that way illustrates the challenges inherent in setting up a public control system, based on civic convention, when facing an accelerated modernization of the food system. While some consumers’ reactions in Western countries are seen as a rejection of the modern industrialized food sector (Setbon et al. 2005), reactions in Vietnam reveal that sanitary crises can, on the contrary, generate major opportunities for the development of an industrialized food sector. That illustrates the role of food safety as a “Trojan horse” for supermarkets breaking into the food markets in developing countries.

The larger portion of urban consumers cannot afford to purchase food in supermarkets, but this segment is decreasing with economic growth and the development of a middle class. They develop numerous practices at home to improve the safety of the products they buy (washing, soaking, etc.). When they purchase food, domestic convention, as typical of a traditional food system and based on face-to-face relationships, still prevails.

Conclusion

In Western societies, food systems have evolved from the traditional to the modern, and then to late modern systems. Late modern systems are characterized by consumers' distrust in food linked to a distanciation process (cognitive and physically) and a distrust in industrialized techniques. In late modernity, features of the traditional systems are revalorized (e.g. farmers markets) and reintroduced in the food systems, in order to reconstruct consumers' trust in food.

The rapid evolution of the Vietnamese food system has gone hand in hand with the emergence of a consumer with both the characteristics of the traditional system (cooking practices to improve food safety, importance of domestic convention), the modern one (attraction for the abundance of standardized goods offered by supermarkets) and the late modern one (low acceptability of "industrial" risks). Vietnamese consumers have some of the features of the "hypermodern eater" described by Ascher (2005). This means that the consumer has the capacity to shift from one world to another, from one kind of convention to another, illustrating the compressed modernity facing the country.

Notes

1. It is partially based on Figuié et al. (2014) which has been updated with some recent research.
2. <http://www.malica-asia.com>
3. Direct qualification refers to "body cues". The indirect qualification procedures can be defined as being those processes which link the subject and the object through the intermediary of a third party enabling the quality of the product to be evaluated. It can also refer to the atmosphere of the place of sale, as perceived by the senses (music, smell, light), namely "situational cues". The modernization process requires shoppers to deal with more indirect qualification procedures, with an increasing number of situational cues and a decreasing number of direct body cues.
4. Along with credence attributes, Darby and Karni (1973) identify two others types of attributes (the attributes refer to the properties or characteristics of a product) enabling consumers to rate the products: attributes

of research or knowledge, and attributes of experience. The research or knowledge attributes can be assessed directly by the consumer at the time of purchase. Experience attributes can be assessed only at the time the products are prepared or consumed.

5. <http://data.worldbank.org/country/vietnam>
6. These figures reflect the value of the currency in 1998. “Food market” means all purchases (food items, beverages) made by households to feed themselves. It therefore does not include the value of what the households produce for their own consumption that is self-consumption (Moustier et al. 2003).
7. <http://www.indexmundi.com/facts/vietnam/urban-population>—based on national statistics and World Bank population estimates.
8. In the Vietnamese supermarket business, it is estimated that approximately 55 per cent of total supermarket sales are food, of which imported food accounts for a small percentage ranging from 5 per cent to 15 per cent of total food sales.
9. In 2014, the revelation by social media (Facebook, blogs) of a massive rise in the number of Measles cases in Vietnam forced the Ministry of Health to be more transparent.
10. Beijing news, 12 June 2012, <http://www.bbc.com/news/world-asia-china-18406012>
11. Thanh Niên News, May 2014 <http://www.thanhniennews.com/society/vietnam-turns-away-500-tons-of-toxic-chinese-fruit-26701.html>
12. VietNamNet Bridge, May 2013, <http://english.vietnamnet.vn/fms/business/74358/vietnam-turning-chinese-refuse-tip-.html>
13. <http://www.tinmoi.vn/tao-fuji-trung-quoc-boc-tui-doc-ban-tran-lan-01934589.html>
14. Brillat-Savarin (1755–1826) is a well-known French gastronome and author of many gastronomic essays.
15. The word “chemophobia” appeared at the end of the 1970s in the community of chemists (see abstracts of the meeting of the American Chemical Society in the 1970s and 1980s). It refers to the supposed exaggerated and irrational fear of chemicals by the public. Chemophobia is associated with the rise of the environmental movement in the USA and the publication of Rachel Carson’s *Silent Spring* in 1962, which is accused of “demonizing” chemicals. We use it here in a neutral sense without judging if this fear is exaggerated or not.
16. It is interesting to compare the perception of the home as a safe place with the data provided by the Vietnamese Ministry of Health at the same

period: 60 per cent of food-borne outbreaks occurred following family meals, 6 per cent in canteens, 21.5 per cent at parties, 9.5 per cent in street restaurants, and 3 per cent in school canteens. This comparison may lead, through a psychological approach of risk, to the identification of a layperson's optimism bias, and of a lower acceptability of suffered risks (i.e. suffered by the restaurant customers) compared to self-imposed risks (Slovic 1987). But data from the Ministry of Health only take into account food poisoning, while surveyed consumers take into account all kind of risks. Moreover, it may also be explained by the fact that, when quoting dangerous places for eating, people refer to a probability of being sick based on their own experience (and so, they take into consideration the ratio number of "bad" meals to number of meals taken at this place, while the Ministry of Health refers to the ratio number of bad meals at this place to the total number of bad meals).

17. A study conducted by ILRI, the International Livestock Research Institute, and quoted by Vorley et al. (2015) proceeds to a comparative analysis of pork sold in supermarkets and wet markets in Hà Nội. It shows that while most pork sold did not meet safety standards in both retailing places, meat was found to be highly contaminated more frequently in supermarkets, probably due to the fact that meats tend to sit longer on supermarket shelves for sale, allowing bacteria to multiply.
18. There are state-owned supermarkets in Vietnam but during the peak of the avian flu outbreak, only the supermarket Metro was allowed to sell chicken in Hanoi.

References

- Ascher, François. 2005. *Le mangeur hypermoderne*. Paris: Odile Jacob.
- Beck, Ulrich. 1994. "The reinvention of politics: Towards a theory of reflexive modernization." In *Reflexive modernization: Politics, tradition and aesthetics in the modern social order* edited by Ulrich Beck, Anthony Giddens and Scott Lash, Stanford, California: Stanford University Press. pp. 1–55.
- Beck, Ulrich, and Edgar Grande. 2010. Varieties of second modernity: The cosmopolitan turn in social and political theory and research. *British Journal of Sociology*, 61 (3): 409–443.
- Beck, Ulrich, and Christoph Lau. 2005. Second modernity as a research agenda: theoretical and empirical explorations in the 'meta-change' of modern society. *British Journal of Sociology*, 56 (4): 525–557.

- Blanchon, Flora. 1995. *Asie. Savourer, Gouter*. Edited by CREOPS. Paris: Presse universitaire de Paris Sorbonne.
- Boltanski, Luc, and Laurent Thevenot. 1991. *De la justification. Les économies de la grandeur*. Paris: Gallimard.
- Bricas, Nicolas. 1993. "Les caractéristiques et l'évolution de la consommation alimentaire dans les villes africaines." In *Alimentation, techniques et innovations dans les régions tropicales.*, edited by J. Muchnik, 127–160. Paris: L'Harmattan.
- Cochoy, Franck. 2002. Une sociologie du packaging ou l'âne de Buridan face au marché. Paris: PUF.
- Darby, Michael R., and Edi Karni. 1973. "Free Competition and the Optimal Amount of Fraud." *Journal of Law and Economics* 16:67–88.
- de Krom, Michiel. 2010. "Food risk and consumer trust. European governance of avian influenza." PhD, School of Social Sciences, Wageningen: Wageningen University.
- Ehlert, Judith. 2016. "Emerging Consumerism and Eating Out In Ho Chi Minh City, Vietnam: The Social Embeddedness of Food Sharing." In *Food Consumption in the City. Practices and patterns in urban Asia and the Pacific*, edited by Marlyne Shakian, Czarina Saloma and Suren Erkman, 71–89. London: Routledge.
- Eurobarometer. 2006. Risk Issues. European Commission.
- Figuié, Muriel. 2004. La consommation de fruits au Vietnam. Tieu dung qua tai Viêt Nam. Hanoi: Malica (CIRAD/IOS/RIFAV/VASI).
- Figuié, Muriel. 2007. "Vegetable consumption behaviour in Vietnam." In *Final summary report of SUSPER (Sustainable development of peri-urban agriculture in South-East Asia)*, edited by Paule Moustier, 100–102. Hanoi: Thê Gioi publishers.
- Figuié, Muriel, Nicolas Bricas, and Paule Moustier. 2014. "Nouvelles pratiques de consommation alimentaire, perceptions des risques et de la qualité des aliments par les consommateurs urbains vietnamiens." In *Viêt-Nam en transition*, edited by G. de Terssac, An Quoc Truong and M. Catlla, 123–140. Lyon: ENS Editions.
- Figuié, Muriel, Nicolas Bricas, Vu Pham Nguyen Thanh, and Nguyen Duc Truyen. 2004. "Hanoi consumers' point of view regarding food safety risks: An approach in terms of social representation." *Vietnam Social Sciences* 3:63–72.
- Figuié, Muriel, and Tristan Fournier. 2008. "Avian influenza in Vietnam: chicken-hearted consumers?" *Risk Analysis* 28 (2):441–541. doi: <https://doi.org/10.1111/j.1539-6924.2008.01039.x>.

- Figuié, Muriel, and Julie Mayer. 2010. "A qui se fier quand les aliments font peur? Labels, points de vente et décontamination symbolique au Vietnam." *Working Paper Moisa* 211004.
- Figuié, Muriel, and Paule Moustier. 2009. "Market appeal in an emerging economy: supermarkets and poor consumers in Vietnam." Review of diffusion sans restriction. *Food Policy* 34:210–217. doi: <https://doi.org/10.1016/j.foodpol.2008.10.012>.
- Figuié, Muriel, and Bricas Nicolas. 2010. "Purchasing food in modern Vietnam: when supermarkets affect the senses." In: Kalekin-Fishman, D., and Low, K. E. Y. (eds.). *Everyday Life in Asia: Social Perspectives on the Senses*, 177–194. Aldershot, Hants: Ashgate.
- Fischler, Claude. 1990. *L'omnivore*. 2001 ed. Paris: O. Jacob.
- Flandrin, Jean-Louis. 1992. *Les chroniques de platine*. Paris: Odile Jacob.
- Fonte, Maria. 2002. "Food systems, consumption models and risk perception in late modernity." *International Journal of Sociology of Agriculture and Food* 10 (1):13–21.
- Friedmann, Harriet, and Philip McMichael. 1989. "Agriculture and the state system: the rise and fall of national agricultures, 1870 to the present." *Sociologia Ruralis* 29 (2):93–117.
- Giddens, Anthony. 1991. *The Consequences of Modernity*. Stanford, California: Stanford University Press.
- Ginhoux, Valérie. 2001. Etude de la sensibilité des consommateurs urbains de viande porcine (Ha Noi et Hai Phong, Vietnam). GRET, VASI, VSF, CIRAD, Programme Fleuve Rouge.
- Guénel, Anne, and Sylvie Klingberg. 2010. "Press Coverage of Bird Flu Epidemic in Vietnam." In *Liberalizing, Feminizing and Popularizing Health Communications in Asia*, edited by Liew Kai Khiun. Farnham: Ashgate.
- Kerkvliet, Benedict J. Tria. 2001. An Approach for Analysing State-Society Relations in Vietnam. *Journal of Social Issues in Southeast Asia* 16 (2): 238–278.
- Kjaernes, Unni, Mark Harvey, and Alan Warde. 2007. *Trust in Food. A Comparative and Institutional Analysis*. Hampshire: Palgrave Macmillan.
- Kyung-Sup, Chang. 2010. The second modern condition? Compressed modernity as internalized reflexive cosmopolitization. *British Journal of Sociology*, 61 (3): 446–464.
- Lepiller, Olivier. 2005. "Les mutations de wla société urbaine de Hanoi (Viêt Nam) – Illustration par des portraits de mangeurs." Mémoire DESS "Sciences Sociales Appliquées à l'Alimentation" (mémoire encadré par Poulain J.-P., Figuié M). Université Toulouse de Mirail, Toulouse.

- Malassis, Louis, and Martine Padilla. 1986. *Economie Agro-Alimentaire*. Vol. III: L'Economie mondiale. Paris: Cujas.
- Moustier, Paule, Dao The Anh, and Muriel Figuié eds. 2003. *Food markets and agricultural development in Vietnam*. Hanoi: The Gioi.
- Moustier, Paule, Jia, Xiangping, Nguyen Thi Tan Loc, Marie-Vivien Delphine. 2014. Exploratory results on food safety management in Chinese apple chains. Montpellier, Cirad report. <https://agritrop.cirad.fr/583383/>
- Mullman, Steve. 2016. "A Taiwanese Steel Plant Caused Vietnam's Mass Fish Deaths the Government Says." Quartz. 30 June 2016, retrieved 8 July 2016. <https://qz.com/718576/a-taiwanese-steel-plant-caused-vietnams-mass-fish-deaths-the-government-says/>
- Nguyen Thi Tan Loc, Sau Nguyen Thi, Hang Ngo Thu, Think Le Nhu, and Anh Hoang Viet. 2016. Situation of the apple market and consumption in Vietnam. Hanoi: Sustainapple project, FAVRI, CIRAD, MALICA.
- Pham Van Hoi, Arthur Mol, and Peter Oosterveer. 2013. "State governance of pesticide use and trade in Vietnam." *NJAS – Wageningen Journal of Life Sciences* 67:19–26.
- Poulain, Jean-Pierre. 2012. "Risques et crises alimentaires." In *Dictionnaire des cultures alimentaires*, edited by J.-P. Poulain, 1168–1185. Paris: PUF.
- Poulain, Jean-Pierre. 2017. *The Sociology of Food. Eating and the Place of Food in Society*. Translated by Augusta Dörr. London: Bloomsbury Publishing.
- Setbon, Michel, Jocelyn Raude, Claude Fischler, and Antoine Flahault. 2005. "Risk perception of the 'mad cow disease' in France; determinants and consequences." *Risk Analysis* 25 (4):813–826.
- Simoons, Frederick J. 1991. *Food in China. A cultural and historical inquiry*. Boston: C.R.C Press.
- Sipana, Chan, and Paule Moustier. 2004. Socio-economic strategies and results of vegetable traders in Phnom Penh (Cambodia). Montpellier, CIRAD: Susper Project (CIRAD-AVRDC).
- Slovic, Paul. 1987. "Perception of risk." *Science* 236:280–285.
- Sylvander, Bertil. 1995. "Conventions de qualité, marchés et institutions: le cas des Produits de Qualité Spécifique." In *Agrolimentaire: une économie de la qualité.*, edited by F Nicolas and E. Valceschini, 167–183. Paris: INRA, Economica.
- Tuong, Vu. 2009. The Political Economy of Avian Influenza Response and Control in Vietnam. Brighton: STEPS report.
- Tuong, V. 2010. Power, Politics and Accountability: Vietnam's Response to Avian Influenza. In Scoones, I. (Ed.), *Avian influenza: Science, Policy, Politics*. 93–129. London: Earthscan, 52.

- Tuyen Le Danh, Mai Le Bach, Muriel Figuié, Nicolas Bricas, Bernard Maire, Marie-Claude Dop, Chung Nguyen Dinh, and Khan Nguyen Cong. 2004. “Evolution de la consommation alimentaire et de l’état nutritionnel des populations urbaines au Vietnam au cours des vingt dernières années.” *Cahiers Agricultures* 13:31–38.
- USDA – United States Secretary of Agriculture. 2008. Vietnam retail food sector 2008. Gain Report. USDA.
- USDA – United States Secretary of Agriculture. 2013. Vietnam retail foods; Sector report 2013. Gain Report. USDA.
- Vietnamnet. 2014. Vietnam predominantly makes fresh milk from imported powder milk. Posted 30/01/2014. <http://english.vietnamnet.vn/fms/business/93854/vietnam-predominantly-makes-fresh-milk-from-imported-powder-milk.html>
- Vorley, Bill, Paolo Cravero, Paule Moustier, Lan Dinh Tuong, and Delphine Marie-Vivien. 2015 “Food consumption, urbanisation and rural transformations (final draft).” Regional workshop report, Hanoi (Vietnam), 1–2, October 2015.
- Wertheim-Heck, Sigrid, Sietze Vellema, and Gert Spaargaren. 2014. “Constrained consumer practices and food safety concerns in Hanoi.” *International Journal of Consumer Studies* 38 (4):326–336. doi: <https://doi.org/10.1111/ijcs.12093>.
- Wertheim-Heck, Sigrid, Sietze Vellema, and Gert Spaargaren. 2015. “Food safety and urban food markets in Vietnam: The need for flexible and customized retail modernization policies.” *Food Policy* 54:95–106.

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