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PO Box 117  
221 00 Lund  
+46 46-222 00 00

# Finding a balance

Placing Farmers' Markets in the context of sustainability in  
modern society

Licentiate Dissertation, May 2009

Helen  
**NILSSON**



**LUND**  
UNIVERSITY

Artwork by Mathilda Nilsson

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Finally to Mike, without whom I truly would be lost.

*Helen Nilsson*

Lund, May 2009



## **Executive summary**

The centralisation and globalisation of industry and technology has led to systems of food production becoming distant from consumers. Falling prices in the transport sector have also encouraged the movement of products and people across continents and oceans, enlarging our experience. Sources of production are often located in another region, or even another country or continent, with the products then transported long distances before being sold to the consumer. This disengagement from the source of production also means that we are becoming unaware of the environmental impact of the wastes generated from the production and disposal of the products we buy.

Local food systems have offered producers and consumers the opportunity to re-establish contact, have re-created traditional meeting places for the community, and have offered a more direct route to market for food. These food products are often produced by farmers on a small scale, using alternative methods and providing a food product with a perceived better quality (in terms of taste and freshness), compared to conventional products purchased through conventional channels; that farmers can also earn a little extra money by selling their products in this way is an additional bonus. Consumers gain access to quality products that are not available in supermarkets at a reasonable price, and learn about the identity and origin of the food they are eating, as well as enjoying a renewed association with the producer of their food.

Academic research on Farmers' Markets has been conducted in a number of countries, for example, the UK (Archer, Garcia Sánchez et al., 2003; Holloway and Kneafsey, 2000; Kirwan, 2006; Taylor, Madrick et al., 2005), the USA (Alkon, 2008; Cheryl and Miller, 2008; Tiemann, 2008; Varner and Otto, 2008); New Zealand (Guthrie, Anna et al., 2006; Lawson, Guthrie et al., 2008); Ireland (Moore, 2006); and Norway (Norsk-Landbrukssamvirke, 2002). Much of the research focuses on the contact between the consumers and producer, as well as the economic gains that can be made. There is some data covering Sweden (Carlsson-Kanyama, Sundkvist et al., 2004; Hamilton, 2004; Loberg and Nurkkala, 2006; Meyer von Bremen, 2005a; 2005b); but little is known about the consequences of the markets for those involved, as well as the surrounding community, the positive value they can offer, and if they are an option for those wanting to invest in a more sustainable lifestyle.

The main objective of this research was to gain an understanding of Farmers' Markets in Sweden and discover if they have a positive value for producers and consumers wanting to follow a more sustainable lifestyle.

In order to fulfil the stated objective, the following questions were asked.

- What are the advantages and disadvantages of local food systems, in the context of sustainability?
- What motivates a farmer to be involved in a Farmers' Market?

The research questions required a multiple approach to the problem statement. The concept of Sustainability was used for the first research question, and the Self Determination Theory was used for the second question. The theories were not used in an overlapping manner, rather as complementary in different research cycles in order to find answers to the two different research questions. The three elements of SDT, competency, autonomy and social relatedness, were used to construct the questionnaire and allow analysis.

When measuring the impact of an activity or action in relation to sustainability, the three factors of environmental, economic and social are often used to measure the effect of these activities. The three pillars of sustainability were therefore selected as suitable dimensions for analysis. The use of the three pillars acted as a filter to the information gained through the literature as well as creating structure for the questions asked during the interviews and questionnaires.

The results presented in the articles and used to answer the research questions are based on surveys conducted between 2005 and 2007 at local Farmers' Markets and with local organic producers. In depth interviews and questionnaires were used to gather the data, which was then analysed using the different analytical theories explained in the articles.

The first research question of this thesis asked, what are the advantages and disadvantages of local food systems, in the context of sustainability? This question was answered using elements from the first two articles; "Local food systems from a sustainability perspective – Experiences from Sweden" (Nilsson, 2009a), and "Socio-economic aspects of Farmers' Markets in Sweden" (Nilsson and Mont, 2009).

It was observed that consumers see the benefits of social interaction with producers in Farmers' Markets as well as using it as a source of quality food and as a way of actively supporting local small scale producers. Producers gain through an increase in income, an establishment of contact with consumers, and the creation of a marketing opportunity for their products. In terms of the environmental impact, the jury is still out regarding the green claims initially made by local food system supporters. Further study is required in this area to ensure there is transparency, both for the producer and consumer.

The second research question is answered using information from the final article, "Producer's motivation for the involvement in local food systems and their believed contribution to the local community" (Nilsson, 2009b).

The three elements that drive motivation, competence, autonomy and social relatedness indicate that there are a number of factors that influence producers decision making. Producers are, as a whole, confident farmers with belief in their abilities as food producers. They are in a position where they own their farms and despite the high average age, are keen to follow alternative production routes. The social connection with consumers and their contribution allows the producers an opportunity to interact with those who purchase their products; in addition it contributes to a sense of belonging in their community.

From the literature reviewed and the conducted research, it can be concluded that local food systems are not the answer to all problems associated with global food systems. The economies of scale found in large scale production and distribution can lead to economic and environmental benefits in many areas. There are also adverse environmental impacts of local food system. The issue of transport, both to the market and away from it is a subject which has generated much debate.

That being said, it has been shown in this research that Farmers' Markets can contribute to the social and economic wellbeing of producers and consumers through: increased social interaction between producers and consumers, which have allowed the development of trust relationships between them. In addition, producers have seen an increase in their income, though the level varies from region to region.

It is believed that Farmers' Markets are a positive addition to the market place as they offer an opportunity for consumers to establish contact with



the source of their food and allow producers to sell their products without the middleman. They also promote and strengthen regional identity by upholding traditional methods and products. It should be noted though that they are not the sole answer to the environmental and social issues that plague the food industry. The relationship between local and global, small and large scale is a delicate one which still needs research in order to find the optimal balance between the two types of systems. It is hoped that this research has contributed to finding this balance and can lead to a better understanding of the roles the two systems can play.

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## **Abbreviations**

CAP	Common Agriculture Policy
EU	European Union
IP	Integrated Production
LRF	Lantbrukarnas Riksförbund
SDT	Self Determination Theory

# CHAPTER ONE

---

## 1. Introduction

### *1.1 Background*

The centralisation and globalisation of industry and technology has led to systems of food production becoming distant from consumers. Falling prices in the transport sector have also encouraged the movement of products and people across continents and oceans, enlarging our experience. Sources of production are often located in another region, or even another country or continent, with the products then transported long distances before being sold to the consumer. This disengagement from the source of production also means that we are becoming unaware of the impact of the wastes generated from the production and disposal of the products we buy, an “out of site out of mind” mentality (French, 2004).

As a response to this continuing trend in globalisation and centralisation of the production of goods and services, there has been a movement towards more local systems as an alternative system of production and distribution (Goering, Norberg-Hodge et al., 1993; Hines, 2000; Kimbrell, 2002; Lang and Heasman, 2004; Pretty, 2002; 2005). These local systems claim that they offer the consumer something more than the usual supermarket experience, and give consumers a quality product often produced using environmentally sound processes. Producers also gain a new market for their products, earning money for the small businesses and having the opportunity to meet those who purchase their products. Examples of local systems include Box Schemes, Community Supported Agriculture and Farmers’ Markets, which are the focus of this research.

Farmers’ Markets, in the traditional sense have existed for thousands of years. Farmers have taken their produce to an agreed area in a town, city or village and sold their produce. This traditional method of sale had more or less disappeared from many western countries, with produce being sold through supermarkets, and farmers and producers becoming increasingly alienated from those buying the food. The rise in the popularity in local

food, as mentioned above, has given rise to a rebirth of the traditional market. The USA was the first country where this growth became apparent, followed by the UK and other western countries. Farmers' Markets came to Sweden in 2000, and have enjoyed reasonable success.

Local food systems have offered producers and consumers the opportunity to re-establish contact, re-created traditional meeting places for the community, and have offered a more direct route to market for food. These food products are often produced by farmers on a small scale, using alternative methods and providing a food product with a perceived better quality (in terms of taste and freshness), compared to conventional products purchased through conventional channels. That farmers can also earn a little extra money by selling their products in this way is an additional bonus. Consumers gain access to quality products that are not available in supermarkets at a reasonable price, and learn about the identity and origin of the food they are eating, as well as enjoying a renewed association with the producer of their food.

## ***1.2 Problematisation***

There is some academic research on Farmers' Markets from countries such as the UK (Archer, Garcia Sánchez et al., 2003; Holloway and Kneafsey, 2000; Kirwan, 2006; Taylor, Madrick et al., 2005), the USA (Alkon, 2008; Cheryl and Miller, 2008; Tiemann, 2008; Varner and Otto, 2008); New Zealand (Guthrie, Anna et al., 2006; Lawson, Guthrie et al., 2008); Ireland (Moore, 2006); and Norway (Norsk-Landbrukssamvirke, 2002). Much of the research focuses on the contact between the consumers and producer, as well as the economic gains that can be made. There is some data covering Sweden (Carlsson-Kanyama, Sundkvist et al., 2004; Hamilton, 2004; Loberg and Nurkkala, 2006; Meyer von Bremen, 2005a; 2005b); but little is known about the consequences of the markets for those involved, as well as the surrounding community, the positive value they can offer, and if they are an option for those wanting to invest in a more sustainable lifestyle.

## ***1.3 Research objective and questions***

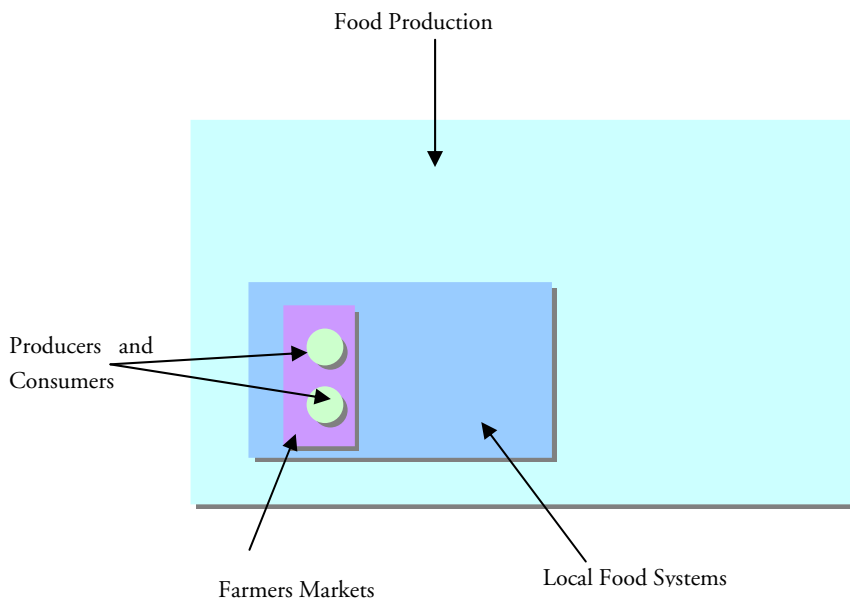
The main objective of this research is to gain an understanding of Farmers' Markets in Sweden and discover if they have a positive value for producers and consumers wanting to follow a more sustainable lifestyle.

In order to fulfil the stated objective, the following questions were asked.

- What are the advantages and disadvantages of local food systems, in the context of sustainability?
- What motivates a farmer to be involved in a Farmers' Market?

## ***1.4 Scope and limitations***

The scope of the research began with a broad overview of the food production system at a global level, before turning the focus to local food systems. There are a number of different local food systems, and one of these was chosen as the main focus of the research, namely Farmers' Markets. Two examples of the markets were chosen for closer study, and emphasis was placed on two of the most relevant stakeholders, the producers and consumers participating in the markets. A diagrammatic illustration of the topic scope can be found in Figure 1.



*Figure 1: A diagrammatic illustration of the scope of the research, bringing the focus from the level of the broad food production down to the key actors in Farmers' Markets, the producers and consumers.*

The literature review took a global perspective before concentrating on Sweden. All of the research was conducted in, and focused on examples in Sweden.



## *1.5 Audience*

This research is of interest to those conducting research into local food systems and Farmers' Markets in particular.

There are many different stakeholders involved in local food systems, both at national and regional level. It is hoped that this research and its findings can be of use to local authorities and organisations, who are thinking of developing an enterprise to promote local food in Sweden.

Even though the focus of the research was Sweden it is hoped that it is of interest to those in other countries. In order for a local system to function well, there are many factors that have to be considered. It is hoped that the understanding that each country is different and requirements are dissimilar for each case.

## *1.6 Structure of the thesis*

The dissertation is divided into seven chapters with the articles included as appendices at the end of the dissertation. The opening chapter outlines the background and motivation for the research, as well as highlights the main research objective and the questions that are answered in the thesis. Chapter Two presents a review of the relevant literature, beginning with an overview of the global and local systems, before focusing on Farmers' Markets and the Swedish situation. The concept of sustainability and the Self Determination Theory are then presented, as well as the analytical framework.

Chapter Three presents the methodological logic used throughout the research, outlining the theory considered and the different practical methods used during the research process. Chapter Four presents the different case study findings from the two Farmers' Markets used in the research. In Chapter Five the research questions are answered using the results attained from the research conducted and published in the articles. In Chapter Six there is consideration of the implications of the findings for finding a balance with local and global and local systems in Sweden. Finally in the Chapter Seven, conclusions are drawn and reflections made for future research.

The dissertation is based on the findings published in two articles and one book chapter. They are briefly summarised in the paragraphs below. Full

versions of the articles and their place of publication can be found at the end of the dissertation.

*Local food systems from a sustainability perspective: Experiences from Sweden*

This first article is an exploratory piece to ascertain the advantages and disadvantages of local food systems from a sustainability perspective. It focused on findings from literature and compared them to examples of two local food systems in Sweden. It used the three pillars of sustainability as a filter for the findings from the literature. It found that the social connection created amongst the producers and consumers was a powerful driver for involvement. The cooperative movement in Sweden meant that farmers were not always in need of finding new markets as maybe their European cousins. The local systems were seen though as a good marketing opportunity. It was undecided if the environmental impact of the systems was positive or negative.

*Socio-economic aspects of Farmers' Markets*

The next article, or more correctly, a book chapter, reports on a study of two Farmers' Markets in Southern Sweden. The purpose of the study was to assess the social and economic benefits of Farmers' Markets for both farmers taking part in the markets and the consumers purchasing the products on sale. Surveys were carried out at the markets amongst the producers and consumers, as well as more in depth interviews with some of the producers and additional stakeholders involved in the markets. While some small economic benefits were found, it was the social benefits and values that were most apparent for both the producers and consumers.

*Producer's motivation for involvement in local food systems and their believed contribution to the local community*

The final article focuses on the motivational factors for producers' involvement in local food systems in Sweden. The article is based on a study conducted with producers involved in the organic movement and Farmers' Markets in Sweden. The article uses the Self Determination Theory as the structural force in the research and draws on the theory's ability to establish motivational factors for behaviour. It was found that producers had high levels of competence and autonomy and felt a strong degree of social relatedness to their local communities. These are key factors in creating motivation for being involved in local systems and

benefiting their economic well-being as well as contributing positively to the environment.

## CHAPTER TWO

## 2. An overview of the research field and theories used

### 2.1 *Global systems*

There are a number of different definitions and explanations for globalisation and its implications for society. A basic definition can explain it as the movement of goods, services, capital, people and information across national boundaries (Alexander and Warwick, 2007). It can be described as a process of primarily economic, but also social and political change that encompasses the planet, resulting in greater homogeneity, hybridization and interdependence of money, people, images, values and ideas that has entailed smoother and swifter flows across national boundaries (Voisey and O'Riordan, 2001). Hines describes two forms of globalisation, the first is internationalism, which is the global movement and exchange of knowledge in the form of the flow of ideas, technology, information, culture, money and goods with the end goal of protecting and rebuilding local economies worldwide (Hines, 2000; Legum, 2003). The second is the systematic reduction of protective barriers to the flow of good and money by international trade rules shaped by and for big business (Hines, 2000).

Globalisation is not a modern invention, it has existed in its various forms since the 19<sup>th</sup> century with the passage of goods between Europe, the Americas and Asia (Alexander and Warwick, 2007).

There are three main themes that come out of globalisation which have relevance for food systems and this research. In practical terms, globalisation links to *trade liberalisation* and increasing the competitive advantage of countries and their industrial sectors. One consequence of this drive to liberate trade and make industries more effective is the development of *economies of scale*. In the last fifty years, the food production industry has become rationalised with economies of scale introducing large scale factory style farming and processing plants, with an increase in yields

and availability of foods. There has also been an increase in the level of *transportation* of foods around the world as trade rules have been liberalised and the cost of transport has decreased.

The *liberalisation of trade* has seen the increase in the development of Multi-National Companies, such as Monsanto and Dow, which control large sections of the supply chain, from seed development and crop protection to the processing of food before distribution to consumers (Manning and Baines, 2004). Taking the food processing industry in the USA as an example, 80% of the beef packing and processing is controlled by only four companies, and 61% of flour milling is controlled by four companies (Millstone and Lang, 2003). One could comment that there is a two tier system in food processing, with a small number of international giants existing alongside thousands of small local and national firms.

The *economies of scale* were encouraged in the food sector in Europe after the Second World War as a response to food shortages. Industrial farming has dominated the meat and dairy sectors in the EU and North America since the 1950s (Millstone and Lang, 2003). Crop production has also been affected by industrialisation, with the increased application of artificial fertilisers and pesticides and the continued mechanisation of the sector. Wheat yields in Europe have increased four fold, from 2 tonnes per hectare to nearly 8 tonnes per hectare in the second half of the twentieth century. Significant increases have also been seen in potato, sugar beet and barley yields (Pretty, 1998).

The *transportation* of foodstuffs around the world has increased in recent years. In the last 40 years of the twentieth century global food exports increased from 190 million tonnes a year, to 774 million tonnes a year (Millstone and Lang, 2003). In particular the transportation of animals across continents has increased, with 44 million cattle, sheep and pigs traded across the world each year (Millstone and Lang, 2003). The average piece of produce in the USA travels 1500 miles to reach its final destination, an amount that has increased 25% since 1980 (Halweil, 2002).

## ***2.2 Local systems***

Morris and Buller enter into the discussion of what is local when they investigate what they see as two approaches to the concept of local. The first approach places focus on “locality as a closed or bounded system” where products are produced, processed and retailed within a certain

geographical area. These local systems are often characterised by alternative channels of distribution, such as direct sale to consumers and direct outlets. The second approach identifies the “locality as value added for export”. In either case the attention to localness can be associated with speciality, tradition and quality (Morris and Buller, 2003). Localisation is another term focusing on the local elements; it can be seen as the antithesis to globalisation, where globalisation is about corporate business and global trading, localisation is more about the empowerment of local communities and government, and the promotion of local trading (Hines, 2000).

Local is a very subjective term. Depending on the context, local can be part of a nation state, the nation state itself or even, a regional grouping of nation states (Hines, 2000). In terms of Farmers’ Markets for example, a distance from farm to market is often used to limit where produce comes from; in Sweden there is a 250 km limit (BeM, 2005), and in the UK it is 160 km, though preference goes to those producers who are within 100 km of the market location (The National Farmers' Retail and Markets Association, 2007). But what of more remote locations, can this definition of local still be applied? Can we also think of scale when we think of a local system? Local often encourages thoughts of small scale, alternative production methods, but are large farms that sell to local consumers then excluded from the concept or included? Local food system is more of a concept than a clear cult defined factual based term.

Local food systems include the concepts of local, small scale, alternative systems; and it offers something else to consumers than current central systems (Sage, 2003). It links to an increase in consumer awareness regarding food production and the search for connection that seems to have started in recent years amongst consumers. There is a drive for not only connection, but also affinity and transparency. To these emotive reasons we can also add a decrease in transport which reduces the overall environmental impact of food and is a positive contribution to a reduction in the release of CO<sub>2</sub> from transport (Norberg-Hodge, Merrifield et al., 2002).

Consumers concerns are seen as a prime motivating factor in a move away from the homogenised products of the global agro-food industry in the western world (Winter, 2003). The term ‘consumer concern’ includes worries about food safety, environmental and animal welfare consequences of food production systems, and links to a decrease in the level of trust with the food industry (Brom, 2000). Incidents of food safety violations, such as

the BSE outbreak in Europe and the USA, Foot and Mouth in the UK, dioxin scares, salmonella outbreaks and avian flu have caused a sense of anxiety amongst consumers in the meat industry (de Jonge, Frewer et al., 2004).

Local food products are often produced on small family farms and the farmers often want to differentiate their products and use alternative techniques than those practiced by conventional farmers. One example of alternative production which is used is organic farming. As a form of high quality or differentiated production, organic farming is seen as having the capacity to extend new market opportunities and value capturing rights, not to mention environmental and human health benefits down the food supply chain for the benefit of consumers, tax payers and farm businesses (Banks and Marsden, 2001). The increasing demand for locally grown organic produce among certain consumer groups reveals how interest in local, small scale organic agriculture, farmland, preservation and open space, and concerns about food safety, may begin to shape eating preferences (Jarosz, 2000). Locally produced food is often thought to be of higher quality and safety than food produced within the circuitry of the global food system (Murdoch and Miele, 1999) (Nygard and Storstad, 1998). Consumers who use local food systems purchase their food mostly from local sources through a variety of marketing channels: farm gate sales, Farmers' Markets, community supported agriculture, farmer cooperatives, box schemes and so forth (van Hauwermeiren, Coene et al., 2005).

The growth of local food systems, such as Farmers' Markets, has been as a result of a number of motivational factors. The following section elaborates on the main forces: the mental and physical length of the food chain; food safety aspects; trust in the relationship between the producer and consumer; and the environmental consequences of the food production and processing industry. These elements are often intertwined and are consequences of each other.

The international trade in food has been increasing rapidly in recent decades leading to an increase in the distance food travels. Further, additional processing steps have been added between the farmer and the consumer leading to an increase in transport costs, energy use and a loss of connection between the farmers and consumers. This increase in trade often gives unprecedented and unparalleled choice – any food any time anywhere. But the “global vending machine” often displaces local cuisines, varieties and agriculture (La Trobe, 2001). It can be said that consumption has become

disconnected from production (Murdoch and Miele, 1999). Instead of selling food to their neighbours, farmers sell into a long and complex marketing chain of which they are a tiny part – and are paid accordingly (Halweil, 2002; La Trobe, 2001; Nilsson, 2005). This is naturally the case for more processed products as costs along the chain have increased for all parties. Although it is interesting to note that even non-processed or lightly processed products (such as bread, milk, eggs and apples) has also seen this trend. Studies have shown that only 26% of checkout prices go to farmers, compared to approximately 50% 50 years ago (Smith, Watkiss et al., 2005).

In recent years, a general disquiet regarding the state of the food industry has grown and a number of food safety scares (Vannoppen, Verbeke et al., 2002), created largely by the globalisation induced modernized industrial techniques used in farming (e.g. feeding animal carcasses back to animals as feed). We have seen the beginnings of a renaissance in how many people think about the food they eat and the relationship that its production has to the local community and economy. With growing globalisation, the relationships have changed between the economic institution the ‘market’ and its social contexts; local alternatives have often developed as a response to this globalization trend (O’Hara and Stagl, 2001). The local food movement has seen examples where the supply chain has been shortened as consumers take the opportunity to buy directly from the producer and provide income for the local community (La Trobe, 2001).

The mistrust of standardized foods produced by industrialized agriculture and processed and distributed by highly concentrated, globalized agro-industrial corporations has given added salience to consumers demands for more transparency (Goodman, 2004). In addition, concerns about food safety, environmental and animal welfare consequences of food production systems, and intrinsic moral objections against genetic modification has also eroded consumers trust in the industry (Brom, 2000).

The environmental consequences of conventional food production, with the input of artificial substances into the farming system, the intensive use of energy in the production and transportation of food, as well as the loss of biodiversity and issues of animal welfare in farming have become more apparent in recent years, and have acted as one of the catalysts to increased consumer interest in how their food is produced, store and transported, and the consequences this has for the environment at both a local and global level.



## ***2.3 Farmers' Markets***

The concept Farmers' Markets can be defined as 'a common facility or area where several farmers/growers gather on a regular, recurring basis to sell a variety of fresh fruits and vegetables and other farm products directly to consumers' (USDA, 2002). When reviewing the literature, common themes were found in the text, such as quality, trust, local production and the environment. The majority of the references were favourable to the concept and covered the main benefits and values that they add to communities and local systems (Brown, 2002; Festing, 1998; Lawson, Guthrie et al., 2008). The issue of food miles is taken up by a number of authors as one of the main advantages for having and promoting Farmers' Markets. However, many of the articles were basing their claims on qualitative information rather than quantitative data. Recent research has questioned the validity of using food miles as an indicator for local food and sustainable development (Smith, Watkiss et al., 2005).

The concept of a producer selling their wares to the end consumer in a market setting is not new. It has been practiced for centuries and is still a common form of trade in many countries, especially developing nations. The rise of the supermarkets and more centralised trading practices has seen the role of the farmer diminish in the food chain as the retailer has gained control of more and more of the supply chain (Smith, Watkiss et al., 2005). The factors discussed above, the length of the chain, food safety scares, trust and environmental consequences, have paved the way for an alternative approach to purchasing food, as a result of consumer concerns as to origins of their food and producers looking for alternative routes to market.

The present Farmers' Market concept began to first surface in the USA in the 1970s. Its popularity has steadily increased but it was in the late 1990's that the concept really began to expand, possibly due to the bout of food health scares that seemed to sweep many developed countries at that time. This expansion was also experienced in Europe, with countries such as the UK and Germany seeing a mushrooming of markets all over the country.

The first Farmers' Market in the UK was held in Bath in 1997 (Chubb, 1998). Today there are over 500 markets certified by a national organisation (The National Farmers' Retail and Markets Association, 2007). In the USA this number is over 2000, though regulation comes at state rather than national level (Festing, 1998). It is estimated that each week over a million

consumers buy produce from Farmers' Markets in the US, and 20 000 farmers sell their produce in this way (Vannoppen, Verbeke et al., 2002). A similar pattern is found in Canada and Australia where markets are regulated and collated under state organisations. Most countries do not have national or state organisation, markets are organised on a regional basis. During the literature search, references to markets within Europe were found from the UK, Sweden, Norway, Finland, Iceland, Ireland, Italy, France, Germany, Greece, Austria and Latvia. There are most likely markets of similar character in other countries, but these were not found due to the language barrier.

There were a number of different definitions of the Farmers' Market concept presented in the literature. The USDA has defined it as '*a common facility or area where several farmers/growers gather on a regular, recurring basis to sell a variety of fresh fruits and vegetables and other farm products directly to consumers*'. Seven characteristics have been used to describe Farmers' Markets: regularity of meeting time; constant physical location; a mix of produce and added value food for sale; a core of management or organisation; a local appeal; and some opportunity for price negotiation (Festing, 1998) (USDA, 2002). In the UK, markets are described as '*food markets where farmers and producers bring their produce for sale direct to the public*'. The produce has to be from a defined local area and produced by those selling it (National-Association-of-Farmers-Markets, 2004).

There is a variation of activity in different countries, although it is difficult to find documented evidence of the results of the markets. There are a number of websites that can be consulted, with information about when the markets are and their locations. In 2001, the decision was reached by farmers groups in Norway to establish Farmers' Markets throughout the country (Norsk-Landbrukssamvirke, 2002). There are now 17 markets from Oslo in the south to Tromsø in the north. The project created similar guidelines that can be found in Sweden and the other countries; and from consulting their web site is proving popular with the Norwegian people.

It is apparent that the role of Farmers' Markets is different in the different countries where the movement is found. This variation in importance of the markets to the producers is an interesting research avenue for later work.

## *2.4 A focus on Sweden*

### **2.4.1 Farming in Sweden**

#### *A brief history of farming in Sweden*

Sweden is one of the biggest countries in Europe. Approximately half of the land area is covered by forest, and more than a third consists of mountains, marshland and lakes. Land under cultivation comprises less than three million hectares, which is seven percent of the total land area (Swedish Board of Agriculture, 2009).

Farming has been part of the Swedish landscape for hundreds of years, with evidence of established land cultivation as early as the middle of the first millennium. By the middle ages, farming was supporting the church, nobility and the state through taxes and tariffs. The traditional agricultural system, which survived until the 19<sup>th</sup> century, was typically built up around a village. The centre of the village comprised of the farmhouses and barns, with cultivated fields bordering the village, and grazing lands on the outskirts. A committee in the village were the main governing institution. Arable fields were divided into strips, with farmers working their owned or leased strip. This traditional system saw arable land lie fallow for one or two years (Saifi and Drake, 2008b).

During the 19<sup>th</sup> century Swedish agriculture experienced extensive change. The population grew, and could not be supported by the land, so there was a mass emigration in the latter half of the 19<sup>th</sup> century; 1.4 million people left Sweden between 1861 and 1930. There was the beginning of an industrialisation in agriculture, with techniques such as crop rotation being introduced which increased yield (Saifi and Drake, 2008b).

The number of farms in Sweden were relatively constant during the first decades of the 20<sup>th</sup> century (Jordbruksverket, 2005). The number began to decrease after the second world war, with the continued mechanisation of the industry and the development of the industrial, trade and service sectors, which drew people away from the farming profession (Saifi and Drake, 2008b).

Structural development in Sweden in the past few decades has led to intensification and specialisation of agriculture and to fewer and larger

farms. In 1961 Sweden had 233,000 agricultural holdings. By 1998 the number had decreased to 85,600. In 1995 Sweden became a member of the European Union, and consequently regulated by the European Common Agricultural Policy (CAP). Since then this structural trend has been intensified and the rate of decline has become somewhat higher in the north. During the period 1990 to 1998, the average size of a farm grew from 29 to 33 hectares, the total number of cows decreased while the average number per farm increased from 22 to 30, and the number of pigs per farm increased from 158 to 315. Since 1994, land use also has changed significantly due to current price and subsidy systems: grain and sugar production increased by approximately ten percent, while oilseed production decreased by 60 percent. The production of legumes (peas and beans) increased by 250 percent. Total agricultural production has increased since EU membership in 1995 (Organic Europe, 2009).

EU membership has substantially influenced the economic development of agriculture in Sweden. Product prices are becoming a less important part of the farm economy, while direct supports are becoming more important. Profitability varies from year to year and from commodity to commodity, but as a whole, profitability has decreased for all production during the past five years.

### ***The cooperative system***

Unlike farmers in many other European countries, Swedish farmers are involved in the processing and marketing of agricultural products. It was during the 19<sup>th</sup> century that farmers started organising themselves, the predominate reason was for the purchase of products and services, as well as the sale and marketing of the products produced by farmers (Svenska Lantmännen, 2008). The farmer owned processing industry now predominates, with meat, grain and dairy industries being dominated by farming cooperatives (Swedish Board of Agriculture, 2009).

Farmers do not need to be concerned about product marketing, input purchases, and prices since their cooperatives buy their products at fixed prices and sell them machinery, fertilisers, seed and other inputs at a lower price (Saifi and Drake, 2008b). Even with recent changes due to European agricultural reforms, it is still a beneficial system for the Swedish farmer.

Farming cooperatives in Sweden employ approximately 36 000 people, with an annual turnover of 83 billion crowns (approximately 7.4 billion euros).

Farmers control large sections of the food production and processing chain, with company names, such as Arla, Milko and Scan household names, although some question whether farmers' influence should stretch so far up the food chain away from production (Flygare and Isacson, 2003).

### ***Farming today***

Swedish farming has changed since the country's entry into the European Union in 1995. The number of people employed in the industry continues to fall, as does the number of farms (Jordbruksverket, 2005). A combination of European agricultural policy and environmental initiatives has led to adjustments in the policies in place in Sweden. The Common Agricultural Policy began to be reformed in 2003, and the general principle of this reform was that sustainable agriculture should be guided towards increased market orientation. The basis for the CAP reform was the sustainable development strategy agreed by the Council of Europe in Gothenburg in 2001 (United Nations, 2008). In terms of local agriculture, European and Swedish agricultural policies now dominate the forces influencing local agriculture (Saifi and Drake, 2008b).

The Swedish government has adopted 16 environmental objectives to reduce the country's environmental impact in a sustainable manner, the goals set should be reached by 2020 (Naturvårdsverket, 2000). There are a number which are directly or indirectly connected to agriculture: a varied agricultural landscape; zero eutrophication; a non-toxic environment; reduced climate impact; good quality ground water; thriving wetlands; and a rich diversity of plant and animal life (United Nations, 2008). In addition, the government has established a goal of 20% of all farmland in Sweden should be certified organic by 2010 (Statistics Sweden, 2008a). In addition, the government has also set a target for the public procurement of food. The goal is that 25% of all food purchased for consumption in schools, nurseries, hospitals and other public institutions, should be organic by 2010 (Ekologiska Lantbrukarna, 2007).

At the same time, there is an increased appreciation of small scale food production in Sweden, with consumer demanding food produced by small scale producers. It is believed that this small scale production can have an important influence on the growth, and sustainable development of rural areas (Miljö och Jordbruksutskottet, 2005).

## **2.4.2 Farmers' Markets in Sweden**

The growth of the Farmers' Market concept in Europe and the USA has been mirrored in Sweden with the introduction of "Bondens egen Marknad" in Stockholm in 2000. The start was motivated by observations from both the UK and USA of a pleasant social atmosphere and the sale of high quality products. The branding expert John Higson was the brainchild behind the introduction of the markets. After touring around both the UK and USA, he constructed guidelines of what should and should not be at a Farmers' Market (Higson, 2005). It was found amongst consumer groups that there was support for this idea, and after approaching a number of organisations and authorities in Stockholm (e.g. Ekologiska Lantbrukarna, Lantbrukarnas Riksförbund (LRF), Stockholm stad), a small pilot project was established to run a Farmers' Market in Stockholm at Katarina bangatan. Of the 2000 farmers that were contacted, 45 agreed to take part and the huge success of the market ensured that there would be more markets, with even the local businesses confirming that their profits had increased during market days (Higson, 2005). This was, however, not the first initiative in Sweden. In 1992 a farmers market was started in the town of Trelleborg by Erika von Boxhoevden. This was not a success, why this was so was not researched at the time, but one commentator suggested that it was "before its time" (Norrman-Oredsson, 2005).

With the success of the market in Stockholm, there was enthusiasm to continue with the markets in the rest of Sweden. Key organisations, such as LRF and Hushållningssällskapet, sponsored pilot projects in places such as Göteborg, Halmstad and Malmö, 13 in total falling under the official trademark for Farmers' Markets in Sweden, Bondens egen Marknad. All of the markets follow the rules laid out by the organisation and producers must sign an agreement that they will follow the rules (see Figure 2 for a list of the rules).

It should be noted that Farmers' Markets, although growing in Sweden are still only a small phenomenon, but one report notes that it could gain greater importance and has the possibility to be a real alternative system for food distribution and sales (Carlsson-Kanyama, Sundkvist et al., 2004). The surveys that have been done at markets amongst producers and consumers have largely been very positive to the markets presence with consumers liking the atmosphere created and producers finding that their profits increased through selling their goods there (Hamilton, 2004; 2005; Higson, 2005; Norrman-Oredsson, 2005). In a report on the Farmers' Market in Halmstad, they found producers could use the market as a means of

reaching new customers and new outlets for their products, it is also an important opportunity for producers to build a network amongst themselves (Adler, Fung et al., 2003).

- 1) The named producer on the application form must be the one producing the food. The producer cannot sell articles bought from other growers or suppliers
- 2) Producers are allowed to work with each other, as long as they display signs that indicate the cooperation.
- 3) Only farm products can be sold, this includes fruit, vegetables, herbs, eggs, meat, cheese, honey and products from bee keeping, cordial and juice, jams, preserves and similar goods, baked products plus plants. Cut flowers and flower arrangements can be sold if they are produced and arranged by the producers. Other products than those named above are not allowed to be sold unless there is a special arrangement with the organisers. Processed products main ingredients should be grown by the producer, ingredients for spices can be bought outside of the farm. The producer can also send their goods away for processing as long as they come back to the producers for selling.
- 4) Selling in the market area before or after the official market time is forbidden
- 5) Producers are responsible for following the rules for production, presentation, labelling, branding and sales of goods
- 6) The producer is responsible for taking away all rubbish from the market, public litterbins are not to be used, the market should be left in the condition it was found
- 7) Producers must place prices and their name clearly for the consumer as well as give accurate information as to the goods source and production
- 8) The market organiser can visit the stalls at any time to ensure that the rules are being followed. If there is a suspicion that rules are not being followed it should be reported in a signed letter
- 9) Every producer must have the correct insurance. The producer is responsible to defend and protect the market organiser from possible claims for damages due to loss, injury, and costs of responsibility during the participation in the market.
- 10) All products must have been grown or raised within a 250 km from the market
- 11) The organiser's decisions concerning the markets are final.

*Source (BeM, 2005)*

*Figure 2: The Rules for selling produce at a Farmers' Market in Sweden*

## ***2.5 Concepts used in the research***

### **2.5.1 The concept of Sustainability**

The globalisation of the world's economy and the industrialisation of production processes has caused rapid economic growth. The undesired

environmental and social consequences of this rapid economic growth have caused concern and have given rise to the notion of sustainable development<sup>1</sup>. The concept of sustainability can be traced back to Aldo Leopold's "Land Ethic" in 1949, when he wrote "an environment policy is right if it preserves the integrity of an ecosystem and wrong if it does not". This view is the logical root of the term that is today called sustainability (Rehber and Grega, 2008). Sustainable development is traditionally defined as "development that meets the needs of the present without compromising the ability of future generations to meet their own needs" (World Commission on Environment and Development, 1987). It is an important concept for integrating social, economic and environmental dimensions of development and addressing jointly the objectives of conservation and change (Hediger, 1999).

This definition of sustainable development, is vague and is sufficiently broad to allow acceptance across many different spectra (Daly, 1996). Divergent interpretations of the objectives and definition of sustainability tend to confuse rather than contribute to the root idea of sustainable development (Hediger, 1999). Economic approaches to sustainability frame the issue in terms of human well-being or utility. The capacity to provide utility is conceptually embodied in four forms of capital, these are: natural; produced or man-made; human; and social (Dietz and Neumayer, 2007).

As a result of the broad scope of the sustainable development definition, two different paradigms of sustainability have developed, weak (economic) and strong (ecological) sustainability. Weak sustainability holds that utility (or well-being) ought to be maintained over time. In this view, natural capital and man-made capital are viewed as substitutes in specific production processes; which means that natural capital can be depleted, unless the utility over time is declining (Brand, 2009). Strong sustainability states that natural capital and man-made capital must be viewed as complementary; capital needs to be kept intact over time. Thus, natural capital ought to be preserved for current and future generations in the long run (Daly, 1996). Weak sustainability is crucial for making sustainable development a meaningful and operational concept; however it is not sufficient as sustainable development also requires that the overall integrity of the ecosystem should be sustained (Hediger, 1999).

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<sup>1</sup> The terms sustainability and sustainable development are used interchangeably in this section.



The concept of sustainable development has been applied to a majority of industries and systems, including agriculture. Man has been practicing agriculture for 10 000 years. The industrialisation of agriculture has made food production more dependent on non-renewable resources, such as fossil fuels and mineral phosphate. Modern agriculture is also contributing to the degradation of ecological systems at local, regional and global levels (Saifi and Drake, 2008a).

The notion of sustainable development of agriculture is based on the 1992 Rio Declaration on Environment and Development, the objective is “to increase food production and enhance food security in an environmentally sound way so as to contribute to sustainable natural resource management” (Rehber and Grega, 2008). Therefore methods and practices promoted have to be able to encourage sustainable food production and processing methods, such as organic farming, and perhaps local food systems.

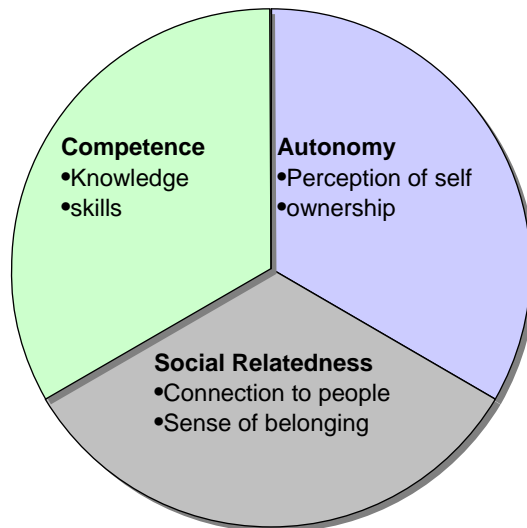
The concept of strong sustainability is particularly appropriate for agriculture. The substitution of natural capital with man-made capital, as suggested as an alternative in weak sustainability is not a viable option as the industry is reliant on natural capital both through organic and mineral inputs.

## **2.5.2 Self Determination Theory**

The Theory of Self-Determination investigates the background to decision making and can shed light on the motivation for being involved in a Farmers’ Market. The Self-Determination Theory (SDT) was born from the fields of psychology and behavioural science. It is an approach to human motivation using empirical methods that highlight the importance of our evolved inner resources for the development of our personality (Ryan and Deci, 2000; Ryan, Kuhl et al., 1997). It can shed light on why we make the decisions we make. An important aspect of the self determination theory is how people’s behaviour is motivated, if it is intrinsically motivated, propelled by an individual’s interest, or extrinsically motivated, activities that are not propelled by personal interest (Gagné and Deci, 2005).

Central to the idea of Self Determination Theory is the distinction between autonomous motivation and controlled motivation (Gagné and Deci, 2005). Autonomy involves acting with a sense of volition and having the experience of choice, it relates to endorsing one’s actions at the highest level of reflection. Self Determination posits a self-determination continuum. There are three headings that can be used in the self-determination

continuum; these are amotivation which means a lack in self-determination; extrinsic motivation; which vary in their degree of self-determination; and intrinsic motivation, which is, as stated above normally self-determined (Gagné and Deci, 2005).



*Figure 3: The three elements of the Self Determination Theory as they are applied in this research.*

The Theory of Self Determination can be applied to the reasoning producers use for being part of a local food system and for producing quality products. Motivation is said to be founded on fulfilling three basic needs; competence, autonomy and social relatedness (Ryan and Deci, 2000). A feeling of competence means to experience ones ability to perform tasks and to experience the contribution of a persons actions to reach the desired goals (Bauer and Mulder, 2006). This means that producers have knowledge and experience of their profession and have confidence in their skills as food producers. The state of autonomy relates to how the individual perceives him or herself as the cause of his or her own actions (Gagné and Deci, 2005). In terms of food producers, this can be interpreted as the freedom a small producer can experience regarding his or her relation to the market and their consumers. Finally social relatedness means the feeling of being connected to other people and belonging to a group (Bauer and Mulder, 2006). This is the link that local producers potentially have to their

local community and their consumers. When these three factors are combined an understanding can be gained of the elements that influence peoples' behaviour and motivates them to follow the certain paths that they choose.

Self Determination Theory has been used to not only discover the motivational factors for behaviour, but it also contributes to the understanding of well-being and goal fulfilment. The theory is not limited to use within one specific research field and has been applied in a number of different areas. Oulasvirta and Blom used the theory to understand why people personalise items of technology, such as mobile phones (Oulasvirta and Blom, 2007). They applied the theory to a number of different examples of personalisation, breaking it down into the areas of autonomy, competency and social relatedness. They found that personalisation can promote autonomy and the sense of ownership, translating a technology, to 'my technology'. They also found that use effectiveness could be improved as personalisation can support competence. Finally technology could support social relatedness by expression of emotion and identity. They came to the conclusion that the personalisation of technology underlies the basic need for self determination (Oulasvirta and Blom, 2007).

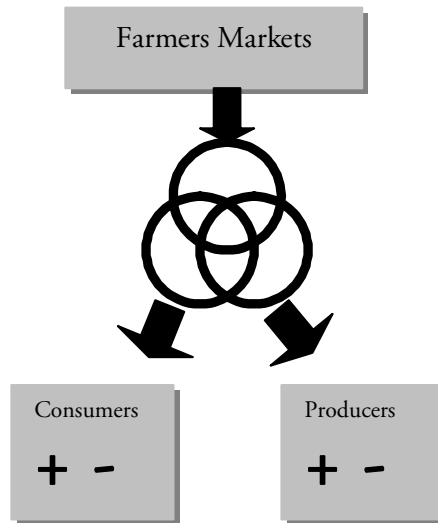
Chirkov et al used SDT to investigate the internalisation of different cultural practices and the link to well-being; they investigated why people practice their culture and how it can contribute to their well-being by studying four different cultures (Chirkov, Ryan et al., 2003). They surveyed over 500 university students from four countries; South Korea, Russia, Turkey and the USA. They collected a large amount of data, classified under the different types of internalisation offered by SDT (external regulation, introjected regulation, identified regulation, and integrated regulation). The data was analysed using an equation modelling technique called means and covariance structure. They found a relation between autonomy and well-being across cultures (Chirkov, Ryan et al., 2003). This supported the general hypotheses they had at the beginning of the survey.

## ***2.6 How it all comes together to form the analysis framework***

The research questions required a multiple approach to the problem statement. The Theory of Sustainability was used for the first research question, and the Self Determination Theory was used for the second question. The theories were not used in an overlapping manner, rather as

complementary in different research cycles in order to find answers to the two different research questions.

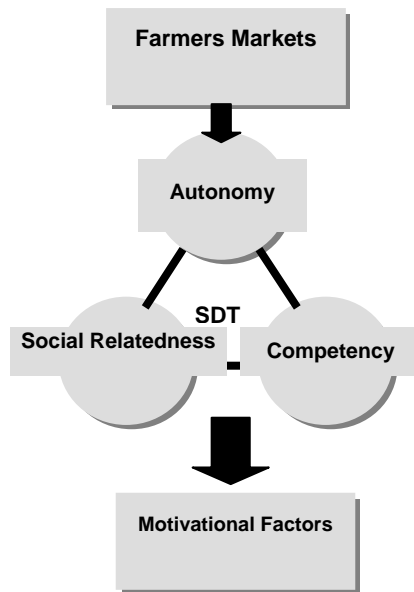
When measuring the impact of an activity or action in relation to sustainability, the three factors of environmental, economic and social are often used to measure the effect of these activities. The three pillars of sustainability were therefore selected as suitable tools for analysis.



*Figure 4 The research flow in the first question using the theory of sustainability as a filter for the information.*

The use of the three pillars acted as a filter to the information gained through the literature as well as creating structure for the questions asked during the interviews and questionnaires.

The examples illustrated above in section 2.5.2 indicate a variety of ways in which the Self Determination Theory can be applied in scientific analysis. Although no published literature could be found where SDT has been used to investigate local systems of food production, the variety of examples given indicates that the theory is adaptable and applicable to a wide range of research fields and topics and has therefore been deemed a suitable tool to use in this research.



*Figure 5: Diagram indicating the use of the Self Determination Theory in the research.*

The three elements of SDT, competency, autonomy and social relatedness, were used to construct the questionnaire and allow analysis. As illustrated in Figure 5, the three elements were used to categorise the motivational factors extracted from the questionnaires completed by the producers.

# CHAPTER THREE

## 3. Methodology

### *3.1 Research position*

The overall objective of this research was to gain an understanding of Farmers' Markets in Sweden and discover if they have a positive value for producers and consumers wanting to follow a more sustainable lifestyle. In order to answer this objective a suitable research paradigm or conceptual framework was required. Positioning research in the correct paradigm is important as it enables a researcher to determine not only what problems are worthy of exploration, but also what methods are available to solve the problems (Deshpande, 1983). It was decided to take a qualitative approach as the research objectives required opinions and insights to be gathered, rather than a domination of facts and figures regarding the markets.

There are four scientific paradigms relating to qualitative research: positivism; critical theory; constructivism; and realism (Healy and Perry, 2000). The last paradigm, realism, is the one that is most suitable for this research. The research has focused on local food systems and Farmers' Markets in particular. The reality of the markets and the producers and consumers involved constitute a real world which can be explored. Realism believes that there is a real world to discover and it consists of abstract things that are born of people's minds but they exist independently of any one person (Healy and Perry, 2000). There are three elements of a paradigm: ontology; epistemology; and methodology. Ontology means how the researchers perceive the world; epistemology is how we conceptualise this reality; and methodology is the technique used to investigate the reality (Denzin and Lincoln, 1998).

The *ontological* position adopted in the research is the realism paradigm which accepts that there is a real physical world existing beyond our knowledge and comprehension. There is also a social world that is being constructed and influenced by our life experiences, knowledge and values. Researchers create frameworks in order to deal with the complexity of the

world. By constructing models and frameworks, researchers can create various realities for themselves, and for others (Flick, 2006).

The *epistemological* position of the research was based on the realism paradigm. An objective approach was taken during the research, with the views and opinions of research objects being recorded without filter. By interviewing a large number of people, through surveys and questionnaires, a multiple perception of reality is gained, which follows the beliefs of the realism paradigm, and also makes the findings value aware rather than value laden, which would have been the case if a more subjective approach was taken (Healy and Perry, 2000).

The *methodological* position relied on the case study approach which incorporated a number of data collection and analysis methods. The two Farmers' Markets were the main cases, as examples of local systems. A number of different techniques were used to gather information from the stakeholders involved in the markets, as well as collate published data on local food systems and Farmers' Markets.

### ***3.2 Research approach***

It was decided that a combination of different research methods allowed for a more in depth understanding of the study area, from a number of different viewpoints. This multi-faceted approach allowed for the combination of both qualitative and quantitative methodologies. There was, however, an emphasis on the qualitative due to the form of the research objectives and subsequent research questions. Qualitative research focuses on description and explanation (Janesick, 1998).

The researcher had a passive role in the case studies in focus. The task assigned to the researcher was to observe and ask questions and gain an understanding of the relationships and key stakeholders involved. An active, participatory role could have influenced the responses fielded by the subjects, and swaying therefore the outcome of the surveys and subsequent conclusions. A case study approach was chosen as it allowed for three specific local systems to be studied in more detail.

### ***3.3 Data collection methods***

#### **3.3.1 Literature review**

Several cycles of literature reviews were conducted. Each cycle had a focus on a different element of local systems depending on the objectives of the particular piece of research being conducted. The procedure, however, was the same each time. Key word searches were conducted, with relevant articles and references being collated via the university library search engine.

The snowball technique was then used to collect data and information from cited references within the primary literature collected. This allowed for a wider sweep of the literature and an assurance that many different viewpoints were covered.

#### **3.3.2 Interviews**

In order to begin the interview process a review was made of relevant websites to establish initial stakeholders to contact and interview. The snowball technique was then used as referrals were made to identify additional stakeholders to be interviewed.

There was found to be a division between the direct and indirect stakeholders involved in the markets and focus was therefore placed on interviewing these stakeholders in order to gain an understanding of the situation surrounding each market. Interviews were deemed a suitable tool of data collection, as they can provide data for academic analysis, measurement, scope or assist in gaining an understanding of an individual or a group perspective (Fontana and Frey, 1998).

The unstructured interviewing technique provides a greater breadth than its structured counterparts, as it is very qualitative in nature (Fontana and Frey, 1998). It is normally used to understand (or attempt to) the complex behaviour of members of society without imposing any prior categorization that may limit the field of inquiry. A list of topics to cover was constructed instead of a complex list of questions, as it allowed for greater flexibility and freedom for the interviewer (Hague, 1993).

#### **3.3.3 Surveys/questionnaires**

Structured questionnaires were directed towards producers and consumers. The researcher asked each respondent a series of pre-



established questions with a limited set of response categories, and the responses were recorded by the researcher. The pace of the interview was controlled by the researcher, and all respondents receive the same set of questions. This pre-determined nature of structured questionnaires is aimed at minimizing errors. Such an questioning style often elicits rational responses, but it overlooks or inadequately assesses the emotional dimension, this form of questioning often forms the bedrock of large surveys (Fontana and Frey, 1998; Hague, 1993).

There were two main blocks of survey questionnaires conducted. The first was a survey of both consumers and producers involved in the Farmers' Markets in Halland and Malmö. Questionnaires were handed out to producers, and then collected the following market occasion. Questions were asked directly to consumers, with over 300 questionnaires being completed. In this first survey cycle, three basic types of questions were included when designing the questionnaires. These were: *behavioural*, where the objective is to find out what people do, facts are recorded and not matters of opinion; *attitudinal* questions where opinions or basic beliefs are gathered about the products that consumers buy and guides the way they act; and finally *classification* questions are used to classify the information once it has been collected, for example, gender, employment etc (Hague, 1993).

The second cycle of questionnaires was sent to the producers involved in the Farmers' Markets, two years after the first research cycle. This time the questionnaires were structured using the Theory of Self Determination, which is a behavioural science tool to gauge motivational forces in decision making. A postal survey was used as it was part of a larger survey which included over 400 questionnaires being sent out to organic farmers and Farmers' Markets participants.

### **3.3.4 Observations**

Observation was the final form of data collection, and was used the least, but it was still an important source of information. Observations were made of the layout and activity at the markets, as well as the general impressions that were given when consumers were moving around and interacting with the producers. These observations were recorded, in both the written and audio form, and added to the data accumulated during the research.

### ***3.4 Reflection on research process***

Motivation for the research was grounded in two avenues of thought. The first was the observed patterns in literature of the increase in consumer demand for more local systems of production and consumption, through desire for local products and outlets witnessed in the increase in, for example, Farmers' Markets and farm shops amongst others. There is also an increase in a demand for quality products and, according to the literature it is the perception of the consumer that locally produced products are often of a higher quality and have more added value than food products bought through conventional channels and produced on a different scale. This inductive approach gathered information acquired through literature surveys and research studies conducted focusing on local food systems in Sweden.

The second avenue explored was the theory of globalisation and local systems of production and consumption with a focus on the food system. These theories can be said to be part of the motivational drivers for the phenomena seen in the consumer desire for local products as indicated above. This more deductive approach focused on developing predictions and explanations from the theories of globalisation and local systems. In this way, both an inductive and deductive approach has been taken during the research.

The interviews were treated as anonymous and no direct references are made to the statements given by specific persons. This was done since the views of the stakeholders as a whole were more important than the individual opinions of individual members, so there is no need to identify the locality of each individual remark. In addition, as the interviewees were informed of the issue of anonymity, it is believed that it allowed stakeholders to be honest and forthright in their opinions of local systems.

The benefit of hindsight would be of invaluable assistance in the vast majority of research studies. Once a subject for research and study has been identified, the problem with the situation explored, and research objectives set, the methodology is then designed based on literature reviews and studies of previous research. It is only once the actual study has been conducted can the mistakes and errors become apparent to the researcher.

It is recognised that the style content of questions in the questionnaires could have been better phrased, which would have elucidated better responses from the producers being questioned. It would have also been

beneficial to have the possibility to conduct a follow up study when additional questions, which had come to light as a result of the findings from the survey, could be asked.

There were two different concepts used as analyses frameworks in the research. These were the sustainability concept and the Self Determination Theory. The concept of sustainability was chosen as it gave an introduction to the research. A more in depth analysis using the capital theory of sustainability may have given different results (Dietz and Neumayer, 2007). As the purpose of the article was to ascertain the advantages and disadvantages of local systems, the theory was deemed appropriate to the task.

When deciding on the Theory of Self Determination a survey was conducted of motivation literature and the theory was isolated as not only the most appropriate, but also the most common used for measuring motivational behaviour. It was found that although the theory had not been used to analyse motivation in the food sector, its application to a diverse number of fields indicates it is adaptable and applicable to more than one field.

## CHAPTER FOUR

### 4. Presentations of case studies

#### *4.1 Farmers' Market in Malmö*

Located on the southern coast of Sweden, with Copenhagen as a neighbour over the sound; Malmö is Sweden's third largest city with an approximate population of 280 000. The market has been in place since 2001 and has grown steadily each year, with the number of producers increasing each season. Located in Drottningtorget (Queens square), which is the site of an old food market. Since the market started in 2002, there has begun a regeneration of the square, with environmentally aware businesses moving in, including an organic food shop, an organic hairdressers, an organic clothes shop, as well as a couple of delicatessens and a café.



There are on average 25 stalls at the seasonal markets held each Saturday from the end of August until the beginning of October. There was variety amongst the stalls with a good choice of fresh vegetables, both organic and conventional, with stalls selling a mix of products as well as those selling single products, such as different types of tomatoes and potatoes.

Figure 6: Farmers' Market in Malmö

There were also a number of stalls selling fruit, such as apples and raspberries. Meat stalls included poultry, venison, lamb, beef and ostrich. In addition there are bread stalls, and stalls selling mushrooms, dried herbs as well as mustard, honey, eggs and rapeseed oil. There are also a number of plant stalls selling both plants and cut flowers.

## *4.2 Farmers' Market in Halland*

Resting on the west coast of Sweden, between Malmö and Gothenburg, lies the historic town of Halmstad, with a population of 58 000. Tourists flock to the region to enjoy the beaches and forests. Set in an idyllic location, nestled between the castle and the River Nissan, the market stalls are framed by the masts of tall ships. The market is situated between the town centre and the railway station so is popular with many who are walking on their way into the town. There was also the possibility of parking close to the market. Each stall was unique with different colours and styles emphasizing the individuality of each of their products.

There was an average of 15 stalls at each seasonal market and one fruit and vegetable stall, which did great business. There were a number of different meat stalls, selling pork, beef, venison and poultry, which were popular, although fish was missing, which a number of the consumers noted. There were also a number of stalls selling honey, jams, bread as well as more unusual items, such as potato crisps.



*Figure 7: Farmers' Market in Halmstad*

# CHAPTER FIVE

## 5. Finding answers

### *5.1 Advantages and disadvantages of Farmers' Markets*

The first research question of this thesis asked, what are the advantages and disadvantages of local food systems, in the context of sustainability? This section is devoted to answering the question using elements from the first two articles; “Local food systems from a sustainability perspective – Experiences from Sweden” (Nilsson, 2009a), and “Socio-economic aspects of Farmers’ Markets in Sweden” (Nilsson and Mont, 2009).

Sustainability, the ability to meet the needs of the present without comprising the ability of future generations to meet their own needs (World Commission on Environment and Development, 1987), is a broad concept which can be applied to many situations. It was of interest to explore how sustainable the markets were in terms of their production methods and Farmers’ Markets sales routes in order to uncover the advantages and disadvantages of the markets.

A review of the literature conducted in the first article gave the advantages and disadvantages of a local system in terms of sustainability, as illustrated in Table 1. Farmers’ Markets are attractive as they offer a direct sales point between the consumer and producer, cutting out the middle man, and offering a chance for the money made to stay in the community. They also offer employment; and research has indicated that producers involved in local food schemes, such as Farmers’ Markets, are more environmentally aware, and use alternative techniques, such as organic agriculture and Integrated Production (IP). A shorter distance between producer and consumer creates a smaller carbon footprint as a result.

The social interaction between the producers and consumers is perceived as an advantage of the Farmers’ Markets. The social exchanges and the relationships of trust and transparency that are created between the two

parties are important contributions to the social capital of the community. Consumers perceived one advantage of the markets as the ability to purchase fresh and quality products; additionally they enjoyed the actual market experience, and gained a sense of nostalgia from attending the markets.

However, there are also drawbacks to the idea of local systems. They can be more labour intensive, raising the cost of the products. Smaller systems can also be inefficient, both financially and environmentally as they can use more resources per unit compared to larger scale operations.

*Table 1 Summary of the main advantages and disadvantages of local food systems*

	<b>Advantages</b>	<b>Disadvantages</b>
<b>Economic</b>	<p>Direct sale to consumers, cutting out the middle man</p> <p>More money stays in the local community</p>	<p>Can be more labour intensive, so cost of production can lead to increase in cost to the consumer.</p> <p>Smaller systems can be more expensive to run and maintain</p>
<b>Social</b>	<p>Maintains employment in rural regions</p> <p>Positive for tourism</p> <p>Contributes to the social capital of a region.</p>	
<b>Environmental</b>	<p>Small producers often more connected to the land and therefore more active in their environmental protection work</p> <p>Claims to reduce transport</p>	<p>Small scale not always environmentally the best choice</p> <p>Energy inefficient transport</p>

(Nilsson, 2009a)

Additionally, the issue of transport in local food systems is a grey area. There are advantages in shortening the distances of products travelling between the farm and the consumer. However, just shortening the distance between the producer and consumer is not always enough to improve the environmental performance of a product. Some research has been conducted focusing primarily on transportation of produce, as mentioned previously; but understanding is still relatively small regarding Farmers' Markets and their environmental impact.

*Table 2: Summary of the main advantages and disadvantages of Farmers' Markets as understood by consumers and producers attending the markets in Sweden.*

	<b>Advantages</b>	<b>Disadvantages</b>
<b>Economic</b>	<p>Attendance is profitable for producers</p> <p>Marketing opportunity for producers</p> <p>Increase in visits to farm shops owned or supported by producers</p>	<p>Some products more expensive than supermarket</p> <p>Some investment in equipment and storage facilities required by producers for their attendance at the markets</p>
	<div style="border: 1px solid black; padding: 5px; width: fit-content; margin: auto;">                     Uncertainty amongst consumers as to whether products were cheaper or more expensive than the supermarket                 </div>	
<b>Social</b>	<p>80% of consumers said they were attending Farmers' Markets to support local producers</p> <p>Increased social contact between producers and consumers</p>	<p>Amount of time the involvement in Farmers' Markets takes for the producers</p>
<b>Environmental</b>	<p>Shorter distance to the market for products</p> <p>Little work done on the environmental impacts of Farmers' Markets</p>	<p>50% of consumers attending the markets drove there, hard to have control over this issue.</p>



When consumers' and producers' comments and opinions are included, we can attain an overview of the advantages and disadvantages in participating in Farmers' Markets. As illustrated in Table 2, the producers and consumers were, in general, positive to the concept and in the case of the consumers, almost unwilling to accept any failings in the concept.

Consumers were asked why they bought products at the Farmers' Markets. They cited freshness and quality as the main driving forces, as well as the social interaction and connection they experienced with the producers. The majority were aware that the prices were higher at the market but were prepared to pay the premium to ensure the purchase of a quality product.

This indicates that consumers are willing to pay for the added value they believe local produce has compared to other products. Quality is a very subjective term and there is no clear evidence that the products are of a different quality, in terms of taste and nutritional content. Where they do differ is the shopping experience that the consumer undergoes when wandering amongst the stalls and talking to the producers. This face to face exchange is undoubtedly important for both the consumer and the producer who also ranks the interaction with consumers as one of the main reasons for attending the markets.

Consumers attending the Farmers' Markets believed they contributed to the local community. By supporting the producers at the market with their purchases, they felt that they were actively aiding the survival of the rural businesses and the countryside as a place of work rather than a mere place to visit.

One of the main environmental and economic benefits championed by the literature of local systems is the decreased amount of transportation required. The issue of export is one which can be found in any small community, island or even country. Not all produce can be consumed in the region of its production, so some export and trade must take place to ensure the survival of these regions.

In summary it can be said that consumers see the benefits of social interaction with producers in Farmers' Markets as well as using it as a source of quality food and as a way of actively supporting local small scale producers. Producers gain through an increase in income, an establishment of contact with consumers, and the creation of a marketing opportunity for their products. In terms of the environmental impact, the jury is still out

regarding the green claims initially made by local food system supporters. Further study is required in this area to ensure there is transparency, both for the producer and consumer.

## ***5.2 What motivates a producer to be involved in a Farmers' Market?***

This section answers the second research question and uses information from the final article, "Producer's motivation for involvement in Farmers' Markets in Sweden" (Nilsson, 2009b).

Being able to understand motivation allows policy and initiatives to be formed in a way that they cater to the needs of focus groups. It is hard to quantify motivational forces. Understanding why people act in the way they do can contribute to shaping policy and initiatives; by understanding behaviour, policy can be formed to promote certain behaviour. The Self Determination Theory was used to understand producers' motivation for their behaviour and involvement in the markets. The three terms used in the theory are competency, autonomy and social relatedness, see Figure 3 earlier in the thesis for an explanation of these terms.

The *competency* of the farmer in their own ability are important elements of estimating the competence level of farmers. Factors such as age and education contribute to building a farmer's competence and knowledge of their profession. There were a significant percentage of farmers who had participated in a special agricultural education. This illustrates a level of professional competence amongst the farmers surveyed, and an expansion of their knowledge within their field.

Farmers are normally referred to as conservative actors, and are therefore often unwilling to develop an area of their enterprise which may encumber their business with risk. This then leads to the observation that either the farmers involved in the markets are veering from the trend and taking a risk, or there is little perceived risk involved in their participation in a Farmers' Market. This perception of risk is possibly reflected in the result of the question asking farmers if they would be willing to be involved in more markets and/or spend more of their time preparing and participating in the markets. The level of risk was maybe perceived as adequate with one seasonal market, attendance at more markets would impinge on time spent on other farm activities and decrease possible income generation in other sales channels.

The chosen method of production followed by farmers is another indicator of their level of competence in their profession. The number of organic producers involved in Farmers' Markets is larger than the national average in Sweden, and reflects an interesting trend in the type of farmers participating in the markets; farmers, who are confident enough to follow alternative production techniques, appear to be more likely to be involved in a local system, such as Farmers' Markets

It can be said that the producers were experienced and confident in their abilities. They had enough faith in themselves and their abilities to make quite radical changes in their production and distribution methods. This confidence can contribute to their belief in the Farmers' Markets concept and act as a driver for their involvement. They are willing to expose themselves to risk by using alternative production techniques, therefore could be more open to the idea of a new sales channel. This level of competence in their profession, can contribute to their motivation for involvement in Farmers' Markets.

The concept of *autonomy* covers the ability of farmers and producers to influence their own situation. This relates to the amount of power the producer has in influencing decisions in their business. The freedom of choice available to the producers in deciding how their farm is managed is important in determining the level of autonomy producers feel they have over their business.

An interesting complement to this issue of autonomy is how producers interpret the concept of local food production. Producers highlighted a number of different factors which they included in their definition of local food production: decreased transport, increase in quality and freshness, the importance of a living community, and the positive contribution they have on the environment. The positive influence the producers can have on a number of different issues illustrates some of the main drivers for participation in local food systems.

The issue of ownership also contributes to the autonomy of the producer. Through owning their farm and land, producers had confidence and more freedom to develop the business how they saw fit instead of having to follow an economic rationale as strictly as might be required. The opportunity to invest and develop a business is greater if the producer owns the farm and has more financial security.

It can be said that the producers shared a strong sense of autonomy and felt control over their situations and believed that they could influence their

situation in a positive manner. They admit that there are some areas where they have no control, for example over subsidy levels, but even there the producers felt confident in knowing where they would revert to conventional farming and when they would continue with organic production. Autonomy relates to the sense of ownership a producer feels, not just over the ownership of their business, but also of their knowledge and skills. When producers are empowered by a sense of ownership not just of their farms, but also of their skills and knowledge, then these can make producers confident in making the decision to be involved in Farmers' Markets.

How connected do producers feel to their local community? It is an important question in assessing the level of social relatedness producers experience, and how that can motivate their decision making process. The answer to this question is illustrated in Figure 8. It has a connection to the sense of autonomy, but in addition it contributes to how connected producers feel to their community and how involved they feel. The environmental impact of the benefit of local systems reflected in comments on reducing transport illustrated the concern and bond the producers feel they have to their environment and the impacts their actions can have on both their community and the environment.

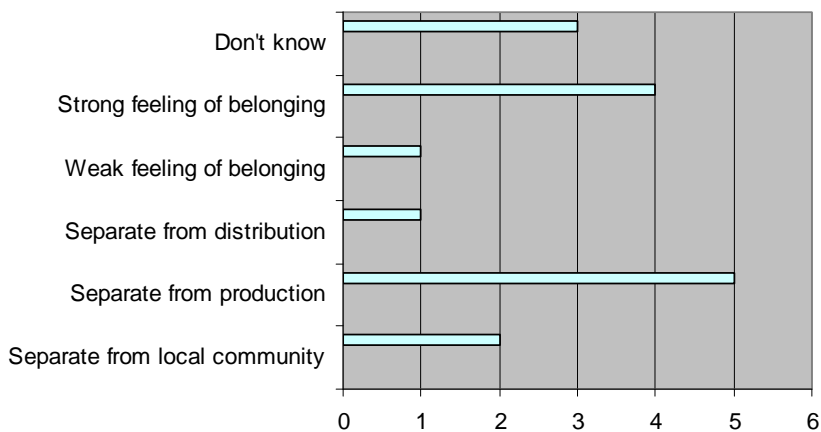


Figure 8 The Producer's sense of belonging to their local community (Nilsson, 2009b)

Producers cited their accessibility to the community, through study visits, cafés, farm shops etc as their main contribution on a social level to the local community. These contributions to the social community underline the fact

that farmers can offer more than just food production as their role in society. Creating tourist opportunities, offering educational opportunities for local school children, and establishing meeting places for the local community illustrates the multifunctional potential of the modern farmer. Multifunctionality covers the many functions provided by agriculture including, landscape and water management, rural cohesion and identity; and food security and safety, and can refer to the fact that one activity can have different outputs (van Huylbroeck, Valerie et al., 2007). By embracing this concept one can appreciate that farming contributes far more to society than just as a source of food, energy and fibres. Farmers' Markets and the other local food systems in existence contribute to the value of this concept and emphasise the additional value farmers and food producers have for the local community. Many producers appreciate this social connection with consumers more than the economic benefits of attending the markets (Nilsson, 2006).

It can be said that the feelings of social relatedness the producers felt were reflected in their believed connection to the local community and the contribution they made to the local community. This connectivity was felt through both their involvement in networks and the opening up of their businesses to the public through open days and study visits. Their desire to feel connected to their community contributes to their enthusiasm and involvement in Farmers' Markets. They feel connected to the consumers and can become aware of their role in the local community as a supplier of not only foodstuffs, but also cultural experience.

The three elements that drive motivation, competence, autonomy and social relatedness indicate that there are a number of factors that influence producers decision making. Producers are, as a whole, confident farmers with belief in their abilities as food producers. They are in a position where they own their farms and despite the high average age, are keen to follow alternative production routes. The social connection with consumers and their contribution allows the producers an opportunity to interact with those who purchase their products and contributes to a sense of belonging in their community.

### ***5.3 Recommendations for the continued success of Farmers' Markets in Sweden.***

In order to overcome the main barriers to the continued success of the markets, a number of initiatives can be promoted to ensure the growth of

the concept in Sweden. Examples of what could be recommended are listed below.

By encouraging farmers to grow a *wider variety* of crops would offer consumers the variety that they want and allow farmers to not focus on one or two main crops. There is also the option of growing different varieties of the same crop, e.g. different colour beetroots, carrots etc. This does not imply any new skills that need to be learned or equipment to buy, but provides the consumer with quality value products that are attractive and appealing.

Local authorities could promote *educational programmes* that inform the local community about food produced in the area and where they can purchase it. The promotion of a shift away from dependence on farmers cooperatives in order for farmers to realize that there are alternatives to the current system

A national *support scheme for new and young farmers* who want to take over farms or start their own businesses would also assist the transfer of farms to the next generation. There are some European schemes already in existence which could be supported more on the national and regional level.

The establishment of *long term contracts* between local farmers and municipalities to promote sustainable public procurement would benefit locally produced food and ensure the survival of small and local food producers. One city that is looking into this is Malmö in Sweden. The city has set itself a target of having totally organic school meals for all 70,000 children in Malmö by 2012. In order to reach this ambitious target it is accepted that there must be close cooperation with local producers. The path to organic conversion is long and full of risk for farmers. It is believed that most of the risk could be removed by structuring long term contracts with farmers covering the conversion period to organic production methods (Graham, 2005). The city wants to use local suppliers for the school meals and contracts would give security to the producer and customer in the region, a win-win situation for all involved.



## CHAPTER SIX

### 6. Finding a balance between local and global

#### *6.1 Scenarios forecasting change in our food systems*

##### **6.1.1 Introduction to the scenarios**

In this section, two different directions food systems can go are presented. The use of two scenarios created especially for this thesis act as an illustration the extremes that can occur within the food system. The two scenarios are set 10 years in the future and are at either end of a spectrum. In the first scenario, there is a pessimistic view for the survival of local food systems, with global systems dominating. In the second scenario, there is a more idealised picture of the future, with local food being found everywhere. How realistic are these images?

By their very nature, scenarios are a little like cartoons, a rough sketch or an artist's impression of a future situation. Both of the scenarios are located in Skåne, southern Sweden. The same farm is used to compare the conditions that can be expected in the future. The scenarios are not meant to be entirely realistic, but designed to make one consider the consequences of events. When the future is considered in a logical way, change is not normally very drastic. Conditions in the farming industry do not normally alter dramatically in a short period of time, normally there are small changes that can affect the future. However violent change, such as the changes to farming after the foot and mouth epidemic in the UK, can occur, and this factor cannot be totally excluded when considering the scenarios.

Factors that are considered in the scenarios include such things as the effect of cooperatives, global trade, the current financial crisis, the power of multinationals, and consumer support.

The two scenarios are very different. In the first scenario, there is very little local production and consumption of food. Most food is imported and



small farmers and producers have gone out of business. Employment opportunities have been lost in the rural community and land is lying forgotten with no future use for it. There are environmental benefits championed in terms of energy efficiency which could take precedent over the need or want for local food.

In the second scenario, the picture is a lot more positive. The local food sector is active and there are a number of opportunities for consumers to buy local produce. Transportation has been made environmentally sound by the use of electric vehicles, and there are employment opportunities in the local community again.

One can of course ask the immediate question, are they so extreme, or can they be placed in our society, but just at a different point in time. In fact, both scenarios are anchored in reality. For producers in countries without farmers' cooperatives, and in a time before Farmers' Markets, it was difficult for many to find markets for their products, and a large number went out of business.

### **6.1.2 Scenario 1 – a world out of balance**

Mikael Larsson looked at the clock; it was nearly time for the children to catch the bus to school. He looked out of the window at the scrubland that bordered his house as he sipped his coffee. The land had been in his family three generations and his father had hoped Mikael would carry on growing vegetables as the last two generations of his family had done. There was no money in farming anymore. They only had 20 acres of land with a variety of root and leaf vegetable crops, but they could not compete with the larger farms, and the cheaper vegetables imported from other countries.

Mikael put down his coffee cup and called to his children to put their coats on. Together, they walked out to the road outside and crossed over to wait for the school bus. A large truck rumbled by, with a logo on the side of a Danish milk company.

“Dad, why can we not buy Swedish milk anymore?” asked his son.

“Well some of the milk is Swedish, it is just mixed up with the Danish milk at the dairy”, he answered. The local dairy company who had bought milk from the region's farmers and distributed milk and other dairy products had been bought up by a larger dairy a few years ago.

After the children had boarded the bus, Mikael took his car and drove to work at a local supermarket. He had stopped farming the land a couple of years before. As he was a small producer he did not produce enough vegetables to sell to the supermarkets who had more and more abandoned the traditional farming cooperatives who had been the middle men in Swedish farming for so long. Left to fend for themselves many small producers and farms had gone out of business and consumers were left with little choice but to buy the imported food on offer in supermarkets.

Mikael felt some envy for the few small farmers still in operation. They had decided to specialize even more than before. Their fresh salad leaves, and baby vegetables were sold directly to restaurants. People now had to rely on supermarkets which focused more and more on the cheapest alternative for most of their products. Now buying Swedish onions and carrots was almost unheard of, with potatoes only appearing for the traditional celebrations around midsummer.

The large trucks delivering their loads of fruit and vegetables were very efficient and the supermarket chain was known for its energy efficiency, and had only the year before been able to announce that all their stores were now carbon neutral. Mikael thought it was a shame though that so little energy was spent on providing good food for the consumers.

He looked at his watch. His wife would just be finishing her shift at the local hospital, before driving home for a few hours sleep until the children come home from school. At dinner he knew they would have the same conversation they had the day before about selling the land for development. He knew there was no point keeping the land as he would never be able to be a farmer again, but he did not want to let the dream go, surely life could get better?

### **6.1.3 Scenario 2 – A rose tinted world view?**

Mikael Larsson looked at the clock; it was nearly time for the children to catch the bus to school. He looked out of the window at the field of plastic and cloth sheeting as he sipped his coffee. The mental list of things to do ran through his head. After the children have taken the bus to school he needed to pack the van and deliver the vegetables to the local supermarket, now had he plugged the van into the power socket last night? If not he would have to take the tractor, which would take so much longer. He had taken the farm over from his father and was proud of continuing the family tradition of growing vegetables. He had converted organic farming a few

years ago, and despite a few teething and pest problems, he and his wife were in general happy with the change. There was a lot more paperwork, but they did not need to spray their crops as much and with the help of other local farmers he had learnt some really good tricks to reduce the impact of pests and diseases.

Mikael put down his coffee cup and called to his children to put their coats on. Together, they walked out to the road outside and crossed over to wait for the school bus. A large truck rumbled by, with a logo on the side of the local milk company.

“Dad is that milk from Jakob’s farm?” asked his son.

“Well maybe, you would have to look at the milk carton for his code, but maybe” smiled his dad. The inclusion of a specific farm code allowed the identification of milk from individual farms, a source of great fun for farmers’ children as they scoured the supermarket shelves “for their own milk”.

After the children had climbed onto the bus, Mikael returned to the farm. He walked past the van and looked at the front, yes, there was a cable running from the front of the van to the wall! Mikael found no difference in performance of his electric van, and it had not cost that much more than a conventional van. With the savings in fuel costs, it was actually cheaper. The only thing you had to remember was to charge it!

Mikael unplugged the van and drove it around to the storage shed where the vegetables harvested the evening before had been stored. There he found his wife packing the leaf vegetables that she has been up picking since 5am that morning.

“Children get off alright?” she asked not looking up from the baby leaves she was washing before packing them in large plastic bags.

“Yes, Anders nearly forgot his gym bag, but Linnea reminded him, she really keeps track of everything, a good big sister!” said Mikael as he started lifting the boxes laden with potatoes and carrots and loading the van.

“I asked Jesper to sow a new batch of leaves today, there is such a demand for them that we really need to look at expanding the amount we grow” said

Maria as she drained the water away from the washing tanks. “If this keeps up we will need to hire some one else to help us”

“I agree, do we have enough for the markets this week?”

“Yes that should not be a problem”. Mikael and Maria attended two Farmers’ Markets every week, as well as selling to local supermarkets. Their remaining crop, they sold via the farmers’ cooperative, though there was less and less every year as supermarkets had begun to cotton on the idea of buying directly from local growers, and the consumers were very enthusiastic. Thanks to their storage sheds which were temperature controlled, they could store their vegetables all winter and keep the shelves stocked with potatoes, carrots onions and tubers all year round.

Mikael smiled to himself as he drove off towards town, the purring noise of the van as it rolled along hardly competing with the sound of the birds singing outside, surely life could not be better!

## ***6.2 Reflection on current world trends***

The increased contact between the producers and consumers in local systems not only creates a relationship of trust between the two groups, but also offers the opportunity to develop community well-being. There are a number of social benefits from this cooperation and many communities are in the position to take advantage of this situation and improve their well-being.

The demand for local food can actually act as a catalyst amongst larger actors propelling them to act as they become aware of consumers wants and demands for local quality produce. This is an important motivating factor for local food systems. They can act as trend shapers and encourage more conscience thought on source and quality of produce being sold to consumers, almost allowing a recovering of a sense of morality within the food and agriculture sector (Sage, 2003).

The high level of concentration in agribusiness, where a handful of companies control each step of the food chain, can actually facilitate a trend towards more sustainable locally based practices as they are relatively few actors who have to change their policy. The big companies are also becoming increasingly aware of consumer concerns and the increasing

pressure from lobbyist and environmentalists (Halweil and Nierenburg, 2004).

There is some evidence to suggest that local food systems can contribute with a reduction in the amount of transport and resource use. In fact, one of the characteristics that is used to define local food systems is the reduction in transport involved in the movement of the food from point of origin to its final destination, “from farm to fork” as it is often called. The distance food travels or “food miles” versus its environmental impact has become topical subject and a number of articles are devoted to the debate (Edward-Jones, Milà i Canals et al., 2008; Pretty, Ball et al., 2005; Sirieix, Grolleau et al., 2008; Smith, Watkiss et al., 2005). The studies demonstrated that not all local systems can offer reduced food miles compared to conventional systems. One report commented on the inefficiency of small producers vehicles compared to modern energy efficient trucks used in the central distribution system (Carlsson-Kanyama, Sundkvist et al., 2004). Even if food travels a shorter distance to the actual market, the number of car journeys increase as people drive to their local farmers. The issue of food miles ties into another issue that relates to sustainability in food production and distribution, and that is organic agriculture.

If local food networks are to become successful alternatives to global systems there can be problems with claims of conventionalism. Some debate that the local food ideal has grown out of a reaction to “conventionalisation” of organic agriculture (Fonte, 2008; Guthman, 2004), where organic products are now produced by most of the major food and beverage companies and sold in most major supermarkets. Will local food systems end up following the same path as a victim of its own success, and what reaction will it receive from its supporters?

It would appear in the first scenario that consumers have abandoned local farmers and producers. Is it possible that there could be such a reversal of fortunes for local producers? Producers rely on the economic wellbeing of their consumers. Without their money, the producers could fail. With the all embracing economic recession that is sweeping the globe, there is a danger that consumers look more at price than quality and identity when they visit their local supermarket.

One could argue that the Swedish cooperative system would protect the small producers in Sweden and ensure that the survival of local products being sold in Sweden. But with issues of trade and claims of protectionism

often cast at the European Union, due to the support given to farming, in the future it may be possible for countries outside of the EU to view the cooperative system as a barrier to free trade.

Reflecting on the issue of the economy; there is a danger that the downturn in economic activity that has befallen the majority of both developed and developing nations can have a detrimental effect on the promotion of local food systems. In the current growth fixated economic system, when people lose their jobs, there is less money in the economy, economic output falls, public spending is curtailed and the ability to service public debt is diminished; a country is plunged into a recession (Jackson, 2009). Could local food systems reflect more of an ecological thinking in a more sustainable economy. In our traditional economy, where growth is the only indicator for prosperity that matters alternatives need to be found if our society is to continue forward. The current growth rate of the world's economy cannot continue at its current rate. Its current stagnation, however long it lasts is purely a blip in the ever upwards pointing curve leading to a larger and larger economy and increased pressure on our finite natural resources.

A continued emphasis on an increase in material wealth for industrialised countries also leads to pressure on material resources. An increase in material wealth adds little to further people's quality of life and may even threaten the foundations of our well-being (Jackson, 2009).

To promote no economic growth is to go against the very system that has been constructed, and risks society experiencing economic and social collapse. However, to pursue it will lead to the continued destruction of the ecosystems that society relies on for its long term survival (Jackson, 2009). Local food systems, such as Farmers' Markets are examples of novel systems that have arisen often due to the increased affluence of consumers. As consumers have become more affluent they have expanded the choices on offer to them by demanding more options in their food purchasing. Being able to buy locally produced food is a recent novelty for consumers, and one which could be affected by changes in the health of the economy. Local food systems could be affected negatively if consumers have less disposable income. However, values and beliefs in local systems can overcome a lowering of economic prosperity, for prosperity goes beyond fleeting material pleasures. It resides in the quality of people's lives and in the health and happiness of their families. It is present in the strength of relationships and levels of trust in the community. Prosperity consists in the

ability to flourish as human beings; within the ecological limits of a finite planet (Jackson, 2009).

The ongoing economic crisis has seen a power shift in the finance industry, with the state taking more control over banks and investment houses in order to 'save the economy'. Will they continue through other industries; almost in a reversal of the wave of privatisation that has occurred in the last three decades? Could farms become centralised with large farms taking over with even more centralised processing and distribution. If this is the case the first scenario could well give an accurate illustration of the future of farming in Sweden.

Centralised and industrialised food has led to an overproduction and consumption with a corresponding increase in the amount of food left over. Recent reports published in both the UK and Sweden have highlighted the issue of food waste (Konsumentföreningen Stockholm, 2009; Waste and Resources Action Programme, 2008). The reports have focused, not just on the amount that needs to be disposed of, though composting and landfill, but more importantly, how much of this waste is avoidable. A third of the food that is purchased in the UK is thrown away, with 61% of that being avoidable (Waste and Resources Action Programme, 2008), in the Swedish study the figure was 57% (Konsumentföreningen Stockholm, 2009). Could more of a focus on local food be one way to reduce this wastage, that is both a waste of resources, and a polluter, each ton of food waste is responsible for 4.5 tonnes of CO<sub>2</sub> being released (Waste and Resources Action Programme, 2008).

Supermarkets often sell their produce in bulk packages, or offer the consumer the chance to 'buy two for the price of one'. This can encourage waste if the consumer then does not use all of the product before it goes bad. Choosing the amount you buy through purchasing loose weight, i.e., you decide how much goes into the bag, allows the consumer the chance to influence their purchasing. Local food also means that the food has travelled a shorter distance and therefore should last longer with the consumer as it has not wasted a lot of time being transported. A closer contact with producers can also give consumers more information as to how a product should be stored and how long a product can actually last if stored properly. This being said, there is also a role for the supermarkets in improving their packaging technology so that food can last longer.

### 6.3 What is needed to create a balanced food system in Sweden?

This dissertation has considered the concept of Farmers' Markets in the context of sustainability and explored the advantages and disadvantages of these markets for the producers and consumers attending them. In this section a return is made to the title of the dissertation when a balance is examined, placing Farmers' Markets in context with the rest of the food system. The emphasis is placed on the economic, social and environmental factors that can contribute to a balance in the system. These factors are considered in Figure 9 where a balanced and an unbalanced system is illustrated.

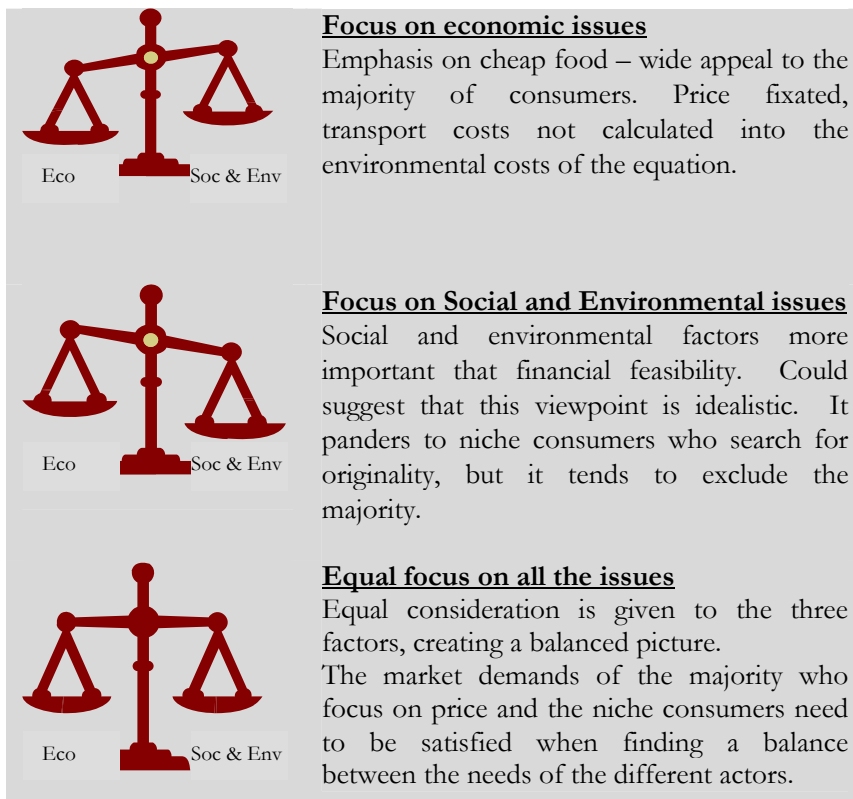


Figure 9: Factors which are affecting the balance of the food systems in Sweden.



With the scales tilted towards the economic focus, the scenario illustrated in the first scenario potentially becomes a reality. The focus on cheap food offers appeal to a number of consumers, especially those struggling to make ends meet. Low price supermarkets make food available, which is often imported with a lower price than domestic products. For example, beef from Argentina being sold at a lower price than Swedish beef, and Danish pork considerably cheaper than Swedish pork. Sweden is known for its high animal welfare regulations, which has increased the cost of production for producers, which in this case is acting as a barrier for the sale of Swedish meat. As the European Union usually chooses the lower standard found across Europe rather than the higher when incorporating new policy and standards into European policy, Sweden will either continue to have higher standards than the other European countries, or have to change its regulations. Having said that, it should be noted that even the low price markets have begun to stock organic products, which indicates that even their customers are beginning to consider more than just their wallet when purchasing food.

Agriculture and food production has become industrialised in the last 50 years (Millstone and Lang, 2003). Less time is spent purchasing and preparing food, decreasing the opportunity to have contact with farmers and losing sight of the source of the food that is eaten. More and more food is imported as well. Sweden, for example, now imports one third of the food that is consumed (Johansson, 2005). While there are products that cannot be cultivated in Sweden and have to be imported, such as coffee, tea and bananas, there are products that Sweden could be self sufficient in, such as meat, dairy products, and some fruit and vegetables.

The balance tipped towards social and environmental issues is reflected in the second scenario. It is admitted that this view could be perceived as a little idealistic. The majority of people will never have the economic ability to purchase what is currently perceived as niche products who attend Farmers' Markets and local farm shops.

In the second scenario, an increase in sales of local food and opportunities for local food indicates continued consumer support for local food. The active consumer support is also illustrated in active Farmers' Markets. The supermarkets are also supportive of local. The transport issue appears to have been dealt even if in a superficial manner with an electric van. More importantly there is social interaction and a strengthening of social capital with support and knowledge sharing amongst the local producers. There

have been investments in storage facilities. This means that crops can be sold all year round and opens up a wider market for the producer. It also means they are not dependent on others to provide storage for them.

Local food systems, such as Farmers' Markets are unlikely to cause a major change in the way all farmers sell their produce. Local systems are not an alternative for bulk commodities nor can they be a substitute for contract sales to manufacturers and retailers. What they do though is create a link between the farmer and consumer. Where there are direct links between producers and consumers, then farmers are better able to respond to the concerns of consumers, and the consumers in turn understand better the challenges and vagaries of food production (Pretty, 2001). This has been confirmed in this research, where both the consumers and producers appreciated the contact that has been made and the opportunity for dialogue and communication it has afforded. They are more of an alternative, a green option as it were, for consumers who are prepared to make that choice. A wider variety in the systems of production of consumption increases choice and empowers both consumers and producers in their decisions of market place and sales point.

The final image in Figure 9 illustrates a balance between economic and social and environmental issues. This could be said to be the realistic ideal that policy and the consumer should be aiming for. Policy changes at both the European and Swedish level can encourage more sustainable practices in the food industry and promote a more balanced picture of food supply and demand in terms of where it comes from, what it costs and the environmental and social implications of its production and distribution.

The agricultural sector in the European Union is regulated by the Common Agricultural Policy (CAP). It has been reformed a number of times, most recently undergoing a comprehensive overhaul in 2003. The successive reforms have focused on making the farming industry more market driven and flexible; allowing farmers to have more power over what they grow, and allow them follow market trends and answer demand. The reforms have also emphasised the importance of sustainable farming, with more money being given to environmental management of land and enterprises in the EU.

Sweden has also been interested in developing policy which can improve the sustainability of farming. A report was published in 1999 entitled "A Sustainable Food Chain"; investigating how the food supply chain could

become more sustainable and efficiency improved (Naturvårdsverket, 1999). In addition, in 1999 the Swedish parliament adopted fifteen environmental goals which should be reached by 2020 in order to ensure a sustainable future for the next generation (Naturvårdsverket, 2000). There are a number of these goals that are relevant both directly and indirectly for agriculture. The most obvious one is “a varied agricultural landscape”, additionally there are “good quality ground water”, “zero eutrophication”, and “reduced climate impact” (Naturvårdsverket, 2000).

As much of the agricultural policy is steered at the European level, there are a number of factors that affect Swedish regulations. One of the barriers to local food is the continued centralisation of the processing industry brought about due to economies of scale as well as health and safety regulations imposed by the EU. These are designed to ensure quality and hygiene standards in the European food processing industry. Unfortunately this has often resulted in smaller enterprises closing as they cannot afford to meet the stringent standards.

One option for the meat industry is mobile slaughterhouses. These are often converted truck trailers, designed to slaughter the most common animals raised for meat. These trucks are now legal in Sweden for the slaughtering of all farm animals after a change in legislation in 2006, before they were only legal for reindeer. Many regions are developing this idea and offering it as an alternative to long distances farmers are currently being forced to send their animals before being slaughtered, with the corresponding negative impact on the quality of the meat at the end of the process.

# CHAPTER SEVEN

## 7. Conclusions

### *7.1 Reflection on the local food*

Buying food is a simple, faceless process. You drive to your local supermarket and walk along the aisles, filling your trolley with cheese, bread, meat and vegetables and everything else your family needs for the week. Labels tell you that your apples are from France, the potatoes Swedish, and tomatoes Dutch. But who produced the potatoes? Are there not Swedish apples? What can I do with these tomatoes on special offer?

Throughout the supermarket there is an incredible choice and variety of products from all corners of the globe. You can literally buy almost anything. But who produced this food? How did they do it? Why are they making just that sort of bread? What do they feed their animals?

All of these questions cannot be answered at the supermarket. There is a gap of knowledge, a break in the line of communication between those who produce food and those who eat it. The supermarkets and its related global industrial production and distribution supply chains, fulfil an important need. Providing food at the price consumers are willing to pay and the selection of products that consumers want.

But what of the other choices; what of the questions that were asked above? There are consumers who want answers to these questions. This is the gap that local food systems can fill. There is a growing number of consumers who are interested to find answers to their questions and know more about the heritage of the food they eat. This is the background to the increase in local food systems that has been seen during the last twenty years or so across Europe and the Americas.

It would be unrealistic to expect all food to be produced and consumed locally. Trade between regions, nations and continents has been happening for hundreds if not thousands of years and to revert to a plate without

imported products such as rice, oranges, bananas, coffee, tea, cocoa and spices is not conceivable for most consumers.

What could happen though is a re-balancing of the food equation, where more products, such as meat, bread and vegetables are produced and consumed more locally. This re-balancing would be fulfilling a need expressed by consumers who want local products and are willing to pay, at the same time supporting local producers and allowing them to stay in business and maintain rural traditions.

There are many different examples of enterprises that can be described as local food schemes: box schemes, community supported agriculture, producer networks, farm shops, and the focus of this research, Farmers' markets.

## *7.2 Final observations from the research*

From the literature reviewed and the conducted research, it can be concluded that local food systems are not the answer to everything. The economies of scale found in large scale production and distribution can lead to economic and environmental benefits in many areas. There are negative connotations of local food system. The issue of transport, both to the market and away from it is a subject which has generated much debate.

That being said, it has been shown in this research that Farmers' Markets can contribute to the social and economic situation of producers and consumers through: increased social interaction between producers and consumers, which have allowed the development of trust relationships between them. In addition, producers have seen an increase in their income, though the level varies from region to region.

It is believed that Farmers' Markets are a positive addition to the market place as they offer an opportunity for consumers to establish contact with the source of their food and allows producers to sell their products without the middleman. They also promote and strengthen regional identity by upholding traditional methods and products. It should be noted though that they are not the sole answer to the environmental and social issues that plague the food industry. The relationship between local and global, small and large scale is a delicate one which still needs work in order to find the optimal balance between the two elements. It is hoped that this research

has contributed to finding this balance and can lead to a better understanding of the roles the two systems can play.

### ***7.3 My contribution to research on Farmers' Markets***

This research contributes to the body of knowledge on Farmers' Markets in Sweden. Through this research more of an understanding has been gained of the motivational factors for attending markets, as well as the benefits and disadvantages of being involved in Farmers' Markets in Sweden. Those organising the markets to understand what can motivate producers to get involved and what might be perceived as barriers to their involvement. Armed with these tools it will assist organisers and related stakeholders in knowing how to attract local producers to their markets, and what key points to highlight when they are marketing the markets to the public.

In addition, the research intends to reach out to consumers, via authorities and organisations as well as promote the fact that there is an alternative or complement to the supermarket, where goods can be purchased and experiences exchanged in the friendly atmosphere of market square.

### ***7.4 What more can be done - further research***

The issue of transport has been taken up a number of times in this research. The green hue around local food systems has begun to get a hint of grey in recent years, as many articles discuss the environmental consequences of local production, if it is really reducing the carbon load of the food produced. Further research is needed into the environmental credentials of local systems. Some research has been done using a life cycle approach for specific products, rather purely measuring the number of kilometres travelled. This is a recommended path to take for local systems, such as Farmers' Markets, so that a clearer picture can be gained of their environmental impact.

The changing perceptions consumers have towards local food through their exposure to Farmers' Markets, as well as their attitudes to the environment and sustainable living, would be a natural progression in the development of further research. This research could focus on a number of in depth interviews with consumers who visit the market, exploring how their awareness and knowledge has changed over time as a result of their visits to the market.

The role of farming cooperatives in Sweden and how they are influencing the development of local food systems would be an interesting course of enquiry to follow. Exploring the relationship producers involved in local food systems have to farming cooperatives, and their perceptions of them, would illicit interesting insights into the establishment and development of local food systems in Sweden.

Finally, research could be conducted on the incorporation of local systems into the mainstream consciousness, through schemes to promote its use more widely, such as the organic school food scheme in Malmö.

# References

- Adler, S., Fung, S., et al. (2003). Learning our way towards a sustainable agri-food system. Uppsala, CUL.
- Alexander, C. and Warwick, K. (2007). "Governments, Exports and Growth: Responding to the Challenges and Opportunities of Globalisation." The World Economy **30**(1): 177-194.
- Alkon, A. H. (2008). "From value to values: sustainable consumption at farmers markets." Agriculture and Human Values **25**: 487-498.
- Archer, G. P., Garcia Sánchez, J., et al. (2003). "Latent consumers attitude to farmers' markets in North West England." British Food Journal **105**(8): 487-497.
- Banks, J. and Marsden, T. (2001). "The Nature of Rural Development: The organic potential." Journal of Environmental Policy and Planning **3**: 103-121.
- Bauer, J. and Mulder, R. (2006). "Upward feedback and its contribution to employee's feeling of self-determination." Journal of Workplace Learning **18**(7/8): 508-521.
- BeM (2005). Bondens egen Marknad hemsida, BeM. **2005**.
- Brand, F. (2009). "Critical natural capital revisited: Ecological resilience and sustainable development." Ecological Economics **68**: 605-612.
- Brom, F. W. A. (2000). "Food, consumer concerns, and trust: food ethics for a globalising market." Journal of Agricultural and environmental ethics **12**: 127-139.
- Brown, A. (2002). "Farmers' market research 1940-2000: An inventory and review." American Journal of Alternative Agriculture **17**(4).
- Carlsson-Kanyama, A., Sundkvist, Å., et al. (2004). Lokala livsmedelsmarknader - en fallstudie Miljöaspekter på transporter och funktion för ökat medvetande om miljövänlig matproduktion. Stockholm, Centrum för miljöstrategisk forskning.
- Cheryl, B. and Miller, S. (2008). "The impacts of local markets: A review of research on farmers markets and community supported agriculture (CSA)." American Journal of Agricultural Economics **90**(5): 1296-1302.
- Chirkov, V., Ryan, R., et al. (2003). "Differentiating Autonomy From Individualism and Independence: A Self-Determination Theory Perspective on Internalization of Cultural Orientations and Well-Being." Journal of Personality and Social Psychology **84**(1): 97-110.
- Chubb, A. (1998). Farmers' Markets - The UK Potential. Bristol, éco-logic.
- Daly, H. (1996). Beyond Growth: The Economic of Sustainable Development. Boston, Beacon.



- de Jonge, J., Frewer, L., et al. (2004). "Monitoring consumer confidence in food safety: an exploratory study." British Food Journal **106**(10/11): 837-849.
- Denzin, N. K. and Lincoln, Y., S (1998). Entering the Field of Qualitative Research. Collecting and Interpreting Qualitative Materials. N. K. Denzin and Y. Lincoln, S. Thousand Oaks, CA, Sage Publications.
- Deshpande, R. (1983). "'Paradigms Lost': On Theory and Method in Research in Marketing." Journal of Marketing **47**(Fall): 101-110.
- Dietz, S. and Neumayer, E. (2007). "Weak and strong sustainability in the SEEA: Concepts and measurement." Ecological Economics **61**: 617-626.
- Edward-Jones, G., Milà i Canals, L., et al. (2008). "Testing the assertion that 'local food is best': the challenges of an evidence-based approach." Trends in Food Science and Technology **19**: 265-274.
- Ekologiska Lantbrukarna (2007). Växande Marknaden - försäljning, volymer och trender för ekologisk mat. Uppsala, Ekologiska Lantbrukarna.
- Festing, H. (1998). Farmers' Markets - An American Success Story. Bristol, UK, éco-logic.
- Flick, U. (2006). An Introduction to Qualitative Research. London, Sage Publications.
- Flygare, I. and Isacson, M. (2003). Jordbruket i välfärdssamhället 1945-2000, Natur och Kultur/LTs förlag.
- Fontana, A. and Frey, J. (1998). Interviewing - The art of Science. Collecting and Interpreting Qualitative Materials. N. K. Denzin and Y. Lincoln, S. London, Sage Publications.
- Fonte, M. (2008). "Knowledge, Food and Place. A Way of Producing, a Way of Knowing." Sociologia Ruralis **48**(3): 200-222.
- French, H. (2004). Linking Globalization, Consumption, and Governance. State of the World 2004. Worldwatch-Institute. New York, W.W. Norton.
- Gagné, M. and Deci, E. (2005). "Self-determination theory and work motivation." Journal of Organizational Behaviour **26**: 331-362.
- Goering, P., Norberg-Hodge, H., et al. (1993). From the ground up - rethinking industrial agriculture. London, Zed Books.
- Goodman, D. (2004). "Rural Europe Redux? Reflections on Alternative Agro-Food Networks and Paradigm Change." Sociologia Ruralis **44**(1): 3-16.
- Graham, T. (2005). Interview on Farmers Markets and sustainable consumption. H. Nilsson. Malmö, Personal Interview.
- Guthman, J. (2004). "The 'Trouble with 'Organic Lite' in California: a Rejoinder to the 'Conventionalisation' Debate." Sociologia Ruralis **44**(3): 301-316.

- Guthrie, J., Anna, G., et al. (2006). "Farmers' markets: the small business counter-revolution in food production and retailing." British Food Journal **108**(7): 560-573.
- Hague, P. (1993). Questionnaire Design. London, Kogan Page.
- Halweil, B. (2002). Home Grown - The case for local food in a global market. Danvers, MA, Worldwatch.
- Halweil, B. and Nierenburg, D. (2004). Watching What We Eat. State of the World 2004. Worldwatch-Institute. New York, W.W. Norton.
- Hamilton, A.-K. (2004). Bondens egen Marknad-Halmstad för marknadsöring av kvalitetsprodukter - Slutrapport. Halmstad, Lantbrukarnas Riksförbund.
- Hamilton, A.-K. (2005). Telephone Interview about Farmers Markets. H. Nilsson. Halmstad, Telephone Interview.
- Healy, M. and Perry, C. (2000). "Comprehensive criteria to judge validity and reliability of qualitative research within the realism paradigm." Qualitative Market Research: An International Journal **3**(3): 118-126.
- Hediger, W. (1999). "Reconciling "weak" and "strong" sustainability." International Journal of Social Economics **26**(7/8/9): 1120-1143.
- Higson, J. (2005). Telephone Interview about Farmers Markets. H. Nilsson. Stockholm, Interview.
- Hines, C. (2000). Localization a global manifesto. London, Earthscan.
- Holloway, L. and Kneafsey, M. (2000). "Reading the Space of the Farmers' Market: A Preliminary Investigation from the UK." Sociologia Ruralis **40**(3): 285-298.
- Jackson, T. (2009). Prosperity without growth?, Sustainable Development Commission.
- Janesick, V. (1998). The Dance of Qualitative Research Design. Strategies of Qualitative Inquiry. N. K. Denzin and Y. Lincoln, S. London, Sage Publications.
- Jarosz, L. (2000). "Understanding agri-food networks as social relations." Agriculture and Human Values **17**: 279-283.
- Johansson, S. (2005). The Swedish Foodprint: An Agroecological Study of Food Consumption. Department of Ecology and Crop Production Science. Uppsala, Swedish University of Agricultural Sciences.
- Jordbruksverket (2005). Swedish Agriculture in figures 1800-2004, <http://www.sjv.se/webdav/files/SJV/Amnesomraden/Statistik%2C%20fakta/Annan%20statistik/Statistikrapport/20056/20056.pdf>. 2008.
- Kimbrell, A. E. (2002). The Fatal Harvest Reader - The Tragedy of Industrial Agriculture. London, Island Press.

- Kirwan, J. (2006). "The interpersonal world of direct marketing: Examining conventions of quality at UK farmers' markets." Journal of Rural Studies **22**: 301-312.
- Konsumentföreningen Stockholm (2009). Rapport från en Slaskhink. Stockholm, konsumentföreningen Stockholm.
- La Trobe, H. (2001). "Farmers' markets: consuming local rural produce." International Journal of Consumer Studies **25**(3): 181-192.
- Lang, T. and Heasman, M. (2004). Food Wars: The Global Battle for Mouths, Minds and Markets. London, Earthscan.
- Lawson, R., Guthrie, J., et al. (2008). "Creating value through cooperation - an investigation of farmers' markets in New Zealand." British Food Journal **110**(1): 11-25.
- Legum, M. (2003). It doesn't have to be like this - Global economics: A new way forward. Glasgow, Wild Goose Publications.
- Loberg, E. and Nurkkala, M. (2006). Making food a sustainable business - a study of four food suppliers and their views on sustainable development. School of Business. Västerås, Mälardalen University.
- Manning, L. and Baines, R. (2004). "Globalisation: a study of the poultry-meat supply chain." British Food Journal **106**(10/11): 819-836.
- Meyer von Bremen, A.-H. (2005a). Farmers and the city. ATL. Stockholm: 12-13.
- Meyer von Bremen, A.-H. (2005b). Varumärkesstriden kring Bondens Egen bilagd. Ekologiskt Lantbruk: 14.
- Miljö och Jordbruksutskottet (2005). Förutsättningar för småskalig livsmedelsproduktion - en uppföljning. Stockholm, Sveriges Riksdag.
- Millstone, E. and Lang, T. (2003). The Atlas of Food. London, Earthscan.
- Moore, O. (2006). "Understanding postorganic fresh fruit and vegetable consumers at participatory farmers' markets in Ireland: reflexivity, trust and social movements." International Journal of Consumer Studies **30**(5): 416-426.
- Morris, C. and Buller, H. (2003). "The Local Food Sector - A preliminary assessment of its form and impact in Gloucestershire." British Food Journal **105**(8): 559-566.
- Murdoch, J. and Miele, M. (1999). "'Back to Nature': Changing 'worlds of production' in the food sector." Sociologia Ruralis **30**(4): 465-483.
- National-Association-of-Farmers-Markets (2004). About Farmers Markets, [www.farmersmarkets.net/started/benefits/default.htm](http://www.farmersmarkets.net/started/benefits/default.htm). 2004.
- Naturvårdsverket (1999). A sustainable food supply chain. Stockholm, Swedish Environmental Protection Agency.

- Naturvårdsverket (2000). *de Facto Miljömålen - vår generations ansvar*. Stockholm, Naturvårdsverket.
- Nilsson, H. (2005). The economic and social aspects of "Bondens egen Marknad" in Sweden - Results of a pre-study. Lund, IIIIEE.
- Nilsson, H. (2006). The Social and Economic aspects of Farmers Markets - from both producers and consumers perspectives. Lund, IIIIEE.
- Nilsson, H. (2009a). "Local food systems from a sustainability perspective: Experiences from Sweden." International Journal of Sustainable Society **Forthcoming**.
- Nilsson, H. (2009b). "Producer's motivation in Farmers' Markets in Sweden." Journal of Rural Studies **UNDER REVIEW**.
- Nilsson, H. and Mont, O. (2009). Socio-economic aspects of farmers' markets in Sweden. System Innovation for Sustainability 4: Sustainable Consumption and Production of Food. U. Tischner, U. Kjærnes, E. Stø and T. A. London, Greenleaf.
- Norberg-Hodge, H., Merrifield, T., et al. (2002). Bringing the Food Economy Home - Local Alternatives to Global Agribusiness. London, Zed Books.
- Norrmann-Oredsson, C. (2005). Personal Interview about Farmers Market in Malmö. H. Nilsson. Skea Gärd, Interview.
- Norsk-Landbrukssamvirke (2002). Anbefalninger for etablering og videreføring av konseptet og forretningsideen Bondens Marked i Norge. Oslo, Norsk-Landbrukssamvirke.
- Nygard, B. and Storstad, O. (1998). "De-globalisation of food markets? Consumer perceptions of safe food: the case of Norway." Sociologia Ruralis **38**: 35-53.
- O'Hara, S. U. and Stagl, S. (2001). "Global Food Markets and their Local Alternatives: A socio-ecological economic perspective." Population and Environment **22**(6): 533-554.
- Organic Europe (2009). Agriculture in Sweden, [http://www.organic-europe.net/country\\_reports/sweden/default.asp](http://www.organic-europe.net/country_reports/sweden/default.asp). **2009**.
- Oulasvirta, A. and Blom, J. (2007). "Motivations in personalisation behaviour." Interacting with Computers **20**: 1-16.
- Pretty, J. (1998). The Living Land. London, Earthscan Publications.
- Pretty, J. (2001). "Some Benefits and Drawbacks of Local Food Systems." Briefing note for Sustain Agrifood Network.
- Pretty, J. (2002). Agri-Culture. London, Earthscan.
- Pretty, J., Ed. (2005). The Earthscan Reader in Sustainable Agriculture. London, Earthscan.

Pretty, J., Ball, A. S., et al. (2005). "Farm costs and food miles: An assessment of the full cost of the UK weekly food basket." Food Policy **30**(1): 1-19.

Rehber, E. and Grega, L. (2008). "Agriculture, Trade and Sustainability." The European Legacy **13**(4): 463-479.

Ryan, R. and Deci, E. (2000). "Delf-Determination Theory and the Facilitation of Intrinsic Motivation, Social Development, and Well-Being." American Psychologist **55**(1): 68-78.

Ryan, R., Kuhl, J., et al. (1997). "Nature and autonomy: An organizational view of social and neurobiological aspects of self-regulation in behaviour and development." Development and Psychopathology **9**(4): 701-728.

Sage, C. (2003). "Social embeddedness and relations of regard: alternative 'good food' networks in south-west Ireland." Journal of Rural Studies **19**(1): 47-60.

Saifi, B. and Drake, L. (2008a). "A coevolutionary model for promoting agricultural sustainability." Ecological Economics **65**: 24-34.

Saifi, B. and Drake, L. (2008b). "Swedish agriculture during the twentieth century in relation to sustainability." Ecological Economics **68**: 370-380.

Siriciex, L., Grolleau, G., et al. (2008). "Do consumers care about food miles? An empirical analysis in France." International Journal of Consumer Studies **32**: 508-515.

Smith, A., Watkiss, P., et al. (2005). The Validity of Food Miles as an Indicator of Sustainable Development. Didcot, AEA Technology.

Statistics Sweden (2008a). Organic Production. The Yearbook of Agricultural Statistics. Statistics Sweden. Stockholm: 175-190.

Swedish Board of Agriculture (2009). Facts about Swedish Agriculture, <http://www.sjv.se/home/factsaboutswedishagriculture.4.7502f61001ea08a0c7fff131211.html>. **2009**.

Svenska Lantmännen (2008). Lantmännen som Kooperation, <http://www.lantmannen.com/sv/Lantmannen-COM/Om-koncernen/Vilka-ar-vi/Historia/>. **2008**.

Taylor, J., Madrick, M., et al. (2005). Trading Places: The local economic impact of street produce and farmers' markets. London, New Economics Foundation.

The National Farmers' Retail and Markets Association (2007). Certified Farmers Markets, [www.farmersmarkets.net](http://www.farmersmarkets.net). **2007**.

Tiemann, T. (2008). "Grower-Only Farmers' Markets: Public Spaces and Third Places." The Journal of Popular Culture **41**(3): 467-487.

United Nations (2008). Agriculture in Sweden, <http://www.un.org/esa/agenda21/natinfo/countr/sweden/agriculture.pdf>. **2009**.

- USDA (2002). U.S. Farmers Markets- 2000 A study of Emerging Trends. Washington, USDA.
- van Hauwermeiren, A., Coene, H., et al. (2005). Food and energy life cycle inputs: a comparison of local versus conventional food systems. Conference on local systems, Helsinki.
- van Huylenbroeck, G., Valerie, V., et al. (2007). "Multifunctionality of Agriculture: A Review of Definitions, Evidence and Instruments." Living Reviews in Landscape Research 1(3): [www.livingreviews.org/lrlr-2007-3](http://www.livingreviews.org/lrlr-2007-3) accessed 26 nov 08.
- Vannoppen, J., Verbeke, W., et al. (2002). "Consumer value structures towards supermarket versus farm shop purchase of apples from integrated production in Belgium." British Food Journal 104(10): 828-844.
- Varner, T. and Otto, D. (2008). "Factors Affecting Sales at Farmers' Markets: An Iowa Study." Review of Agricultural Economics 30(1): 176-189.
- Waste and Resources Action Programme (2008). The food we waste - Executive Summary. Banbury, Waste and Resources Action Programme.
- Winter, M. (2003). "Embeddedness, the new food economy and defensive localism." Journal of Rural Studies 19: 23-32.
- Voisey, H. and O'Riordan, T. (2001). Globalisation and Localisation. Globalism, Localism and Identity - fresh perspectives on the transition to sustainability. T. O'Riordan. London, Earthscan.
- World Commission on Environment and Development (1987). Our Common Future. Oxford, OUP.



## **APPENDIX A - List of author's additional publications**

### **Journal Articles**

Mirata, M., Nilsson, H., et al. (2005). "Production systems aligned with distributed economies: Examples from energy and biomass sectors." Journal of Cleaner Production **13**: 981-991

Nilsson, H., Tuncer, B., et al. (2004). "The use of eco-labeling like initiatives on food products to promote quality assurance - is there enough credibility?" Journal of Cleaner Production **12**: 517-526.

Nilsson, H. (2004) What are the possible influences affecting the future environmental agricultural policy in the European Union? An investigation into the main factors Journal of Cleaner Production **12** 5 461-468

### **Reports in English**

Nilsson, H. (2006). The Social and Economic aspects of Farmers Markets - from both producers and consumers perspectives. Lund, IIIIEE.

Nilsson, H. (2005). The economic and social aspects of "Bondens egen Marknad" in Sweden - Results of a pre-study. Lund, IIIIEE.

Nilsson, H. (2000). European Common Agricultural Policy: An analysis of the main factors affecting its future environmental policy IIIIEE Reports 2000:21.

### **Reports in Swedish**

Nilsson, H. and Hansson, L. (2005). Bondens egen Marknad - Sociala och ekonomiska aspekter utifrån ett producent och konsumentperspektiv. Lund, IIIIEE.

### **Conference presentations**

Nilsson, H., McCormick, K. et al. (2007). Barriers to Energy Crops in Poland – From the Farmers Perspective Energy 2007 First International Conference on Energy and Sustainability New Forest, UK.



Nilsson, H., McCormick, K., et al. (2007). Barriers to the cultivation of energy crops in Poland: The case of willow. 15th European Biomass Conference and Exhibition, Berlin.

McCormick, K., Nilsson, H., et al. (2006). Energy Crops and the Common Agricultural Policy. World Bioenergy Conference, Jönköping.

Nilsson, H. (2002). Total Quality Indicators for the Food Production Chain: Is there a need for more labelling? *Fifth International Conference on Chain and Network Management in Agribusiness and the Food Industry - Paradoxes in Food Chains and Networks* Noordwijk, Holland 6-8 June 2002.

Nilsson, H. (2001). Possible influences on the development of the Common Agricultural Policy's Environmental Policy *The 7<sup>th</sup> European Roundtable on Cleaner Production – Sustainable Production and Consumption Systems – Co-operation for Change* Lund, Sweden 2-4 May 2001

### **Other publications**

Nilsson, H. (2005). Implications of EU Enlargement for the Identity of the Rural Communities of the New Member States. Från Kadvos till CAP - åtta uppsatser om europeiska nätverk, nationer och narrativ. A. Önnersfors. Lund, Centrum för Europaforskning.

## **APPENDIX B - Articles**

Nilsson, H. (2009). "Local food systems from a sustainability perspective." International Journal of Sustainable Society **FORTHCOMING**.

Nilsson, H., Mont, O. (2009). Socio-economic aspects of Farmers' Markets in Sweden System Innovation for Sustainability 4: Sustainable Consumption and Production of Food. Greenleaf

Nilsson, H. (2009). "Producers' motivation for involvement in local food systems and their believed contribution to the local community." Journal of Rural Studies **UNDER REVIEW**.



## Article I

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Nilsson, H. (2009). "Local food systems from a sustainability perspective."  
International Journal of Sustainable Society **FORTHCOMING**



## Article II

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Nilsson, H., Mont, O. (2009) Socio-economic aspects of Farmers' Markets in Sweden System Innovation for Sustainability 4: Sustainable Consumption and Production of Food. Greenleaf



## Article III

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Nilsson, H. (2009). "Producers' motivation for involvement in local food systems and their believed contribution to the local community." Journal of Rural Studies **UNDER REVIEW**





## **IIIEE Dissertations**

Helen Nilsson  
Finding a Balance: Placing Farmers Markets in the context of sustainability  
in modern society.  
IIIEE Dissertations 2009:4

Dagmara Nawrocka  
Extending the Environmental Focus to Supply Chains: ISO 14001 as an  
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Helen  
**Nilsson**

## **Finding a balance**

Placing Farmers' Markets in the context of sustainability in modern society

This thesis focuses on local food systems in Sweden, using examples from the Farmers' Markets that are a growing phenomena in Sweden, as well as in many other developed countries across Europe and the Americas and many other developed countries. Farmers' Markets are about consumers and producers reconnecting and re-establishing the relationships of trust and transparency that are lacking in today's modern industrial food production and distribution chains through consumers meeting producers and interacting with them directly.

This thesis explores the socio-economic aspects of Farmers' Markets and the reasons producers are willing to engage. It asks if a balance can be found between the local system and the global system in our modern fast track lives.

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