

Local Food Systems as Regional Economic Drivers In Southern Minnesota

prepared for
Southern Minnesota Initiative Foundation
and
The McKnight Foundation

by
Jan Joannides
Endowed Chair in Agricultural Systems
Minnesota Institute for Sustainable Agriculture
University of Minnesota

June 2012

Table of Contents

ACKNOWLEDGEMENTS	4
INTRODUCTION	5
PART 1: OVERVIEW OF LOCAL FOODS RESEARCH	6
TERMINOLOGY	6
ECONOMIC ANALYSES	6
MARKETS	7
Farmers’ Markets	8
Community Supported Agriculture Farms	8
Restaurant Sales	9
Campus, Health Care, and Corporate Dining Services	9
Farm to School	10
Grocery Stores and Supermarkets	10
LOCAL FOODS INFRASTRUCTURE	11
Production	11
Processing	12
Aggregation, Storage, Distribution	14
Entrepreneur Assistance	15
FOOD SAFETY AND REGULATIONS	16
PLANNING AND POLICY	16
SUMMARY	17
PART 2: FOOD AND FARM ENTERPRENEUR INTERVIEWS	18
METHODOLOGY	18
Identifying Food and Farm Entrepreneurs	18
Interview Process and Format	18
Figure 1. Interview Map	19
Analysis	19
Diagram 1. Interrelationships	20
MARKET ENVIRONMENT	21
Growth in Demand for Local Foods	21
Market Influences & Challenges	21
Regional Differences	23
Defining Local	23
BUSINESS CONSIDERATIONS	25
Production	25
Distribution	26
Access to Capital and Financing	28
Infrastructure	30

Human Resources	31
Research and Development	31
Regulations and Insurance	31
Competition	32
Support	33
RECOMMENDATIONS	33
Strong Regional Advocates	33
Public Education	33
Needs/Challenges: New Business	34
Needs/Challenges: Established and Growing Businesses	35
PART 3: INPUT FROM REGIONAL PROFESSIONALS	37
FARMERS' MARKET MANAGERS SURVEY	37
Methodology	37
Market Locations and Size	37
Products Available	37
Demographics of Customers	38
Type of Farmers	38
Other Markets for Farmers	39
Barriers to Growth	39
Training and Assistance Needs	39
Perspectives on Increasing Interest in Local Foods	40
Summary	40
ECONOMIC DEVELOPMENT PROFESSIONALS SURVEY	40
Methodology	40
Local Foods Businesses	41
Local Capacity in the Food Sector	41
Assistance Available to Food and Farm Entrepreneurs	42
Summary	43
PART 4: FOOD SECTOR MAPPING AND DATABASES	44
CONCLUSION	46
APPENDIX A. Food System Supply Chain	47
APPENDIX B. Interview Questions	49
BIBLIOGRAPHY	50

ACKNOWLEDGEMENTS

This report, “Local Food Systems As Regional Economic Drivers in Southern Minnesota,” has been prepared for the Southern Minnesota Initiative Foundation (SMIF) and The McKnight Foundation by the Minnesota Institute for Sustainable Agriculture (MISA) at the University of Minnesota.

Author: Jan Joannides

Project Advisors: Rob King and Helene Murray

Interview Acknowledgements:

Keith Adams, Alemar Cheese Company
Michael Delcambre, Bon Appétit
Pete Gengler, Sno Pac Foods, Inc.
Reginaldo Haslett-Marroquin, Main Street Project
Jack Hedin, Featherstone Farm
Doug Hilgendorf, Whole Grain Milling, Co.
Harry and Jackie Hoch, Hoch Orchard & Gardens
Jay Johnson, Bushel Boy
Michelle Keller, LaBore Farms
Eric and Lisa Klein, Hidden Stream Farm
Erik Larson, St. Peter Food Co-op
Todd Lein, Thousand Hills Cattle Company
Mike Lorentz, Lorentz Meats
Nancy Martinson, Lanesboro Local
Kathleen Mckenna, Bon Appétit
Dave and Florence Minar, Cedar Summit Farm
Dallas Moe, Plainview Milk Products Cooperative
Margo O’Brien, St. Peter Food Co-op
John Peterson, Ferndale Market
Steven Read, Shepherd’s Way Farms
Curt and Darcy Riess, Sweet Harvest Foods
Michelle Schry, People’s Food Co-op
Scott and Angie Taylor, Pedal Pushers Cafe
Arion Thiboumery, Lorentz Meats

Other assistance: Pam Bishop, Valentine Cadieux, Clara Dux, Jane Jewitt, Erin Meier, Megan O’Hara, Brett Olson, Jake Overgaard, Steve Roos, Margaret Schneiders, Molly Turnquist, Sarah Wolbert

INTRODUCTION

From the Food Network to Lanesboro Local, interest in local foods is burgeoning. Nearly every publication – from small town papers, to the *New York Times*, to the *American Journal of Agricultural Economics*, are covering this re-localization of the food system.

While much of the infrastructure related to local foods has been dismantled in favor of the efficiencies of consolidation, there is renewed interest in place-based foods and local products. With this slow but increasing favoring of the local—not only in foods, but other goods and services—the local movement can have a “rising tide” effect on towns and regions alike.

Understanding why people purchase local foods is useful in strategizing how to increase the economic impact of this sector. A recent, national literature review by Martinez et al. (2010) identified the following reasons that people purchase local foods:

- they believe local food is fresher, of better quality, or has greater nutritional value
- they want to support local businesses and producers and know the source of their food
- they prefer food grown through environmentally sustainable practices (e.g. organic)
- they enjoy the shopping experience or believe they can obtain a greater variety of food
- and some believe they pay lower prices for local food

Beyond individual consumers, there has also been a push for local foods from the top levels of government, from local governments and from health care and nonprofit organizations. In 2009, the USDA launched the *Know Your Farmer, Know Your Food (KYF2)* effort to carry out President Obama's commitment to strengthening local and regional food systems. Within the state, Minnesota Grown celebrated its thirtieth year in promoting local foods. U.S. House Representative Colin Peterson has hosted three Home Grown Economy Conferences since 2007. And within local governments, food policy councils or commissions have been launched in Minneapolis, Saint Paul and Ramsey County, and southeast Minnesota.

Because of these factors, community leaders across the country are recognizing the potential for “local food” as a vibrant economic driver. What does this mean for southern Minnesota? With the right support, it could mean more profitable family farms, robust value-added food businesses, and increased tax bases for small towns, cities, and counties.

This report has been developed to help explore the economic aspects of local food systems and how they can create economic growth for the 20 counties that are part of the Southern Minnesota Initiative Foundation's (SMIF) region. It consists of three parts:

Part 1 reviews and summarizes local foods research that has been conducted at the local, regional, and national levels. Part 2 summarizes the findings of interviews with food and farm entrepreneurs in the southeast region of Minnesota. Part 3 summarizes input from professionals working with farmers markets and in economic development in the region. Part 4 explores data sources available to identify and link various components of the food system. Part 5 provides a list of potential funding sources for food systems work.

PART 1: OVERVIEW OF LOCAL FOODS RESEARCH

The initial part of this report examines research on food systems that is relevant to southern Minnesota. The findings are divided into the following sections: Terminology, Economics, Markets, Local Foods Infrastructure, Food Safety and Regulations, and Planning and Policy.

TERMINOLOGY

What exactly does the term “local food” encompass? What is currently agreed upon is that there *IS* no standard definition. For some, local is a geographic distance – for example, grown within 50 miles, 100 miles. The 2008 Farm Bill describes states: “locally or regionally produced agricultural food products are defined as those coming from within 400 miles from their origin, or from within the State in which they are produced.” For others, miles may matter, but so do other factors, such as the number of links between the final consumer and the producer, transparency in the system, or retaining the connection to the place the food is grown or to the person who grew or made it.

Clancy and Ruhf (2010) suggest that “local food” connotes “direct, fresh, small volume, small-scale, small farm, niche, producer-consumer connection, limited geographic radius” and that we therefore need to look regionally if we are to arrive at a truly robust food system. In their argument, “local food” will be able to support a segment of the demand, such as farmers’ markets and independent restaurants, but supplying school systems and grocery chains requires a regional food system. They acknowledge, however, that the term “local” has much more cachet than the term “regional” and that some people use local and regional synonymously.

While supply chain is a familiar term in the business world – understanding variations in supply chains is useful when looking at local food as an economic driver. One needs to understand that there are direct-to-consumer markets and intermediated markets, which include sales to restaurants, stores, processors, or distributors. The Hudson Valley Agribusiness Development Corporation concisely explains and illustrates food supply chains in their report: *Understanding Food Systems* (2010). Appendix A provides an abridged form of their information and is a good primer for those new to food systems.

ECONOMIC ANALYSES

A number of studies have quantified the economic impact of local foods—some through straight data collection and some through economic models. A few of the findings are summarized here:

In a recent study, Low and Vogel (2011) report that nationally, 5 percent of farms make local sales, which account for approximately 2 percent of all agricultural sales in 2008. While this is a small part of the agricultural economy, it is a rapidly expanding sector. Local foods represented \$4.8 billion in sales in 2008 and estimates are that the number will top \$7 billion in 2011.

Ken Meter, of Crossroads Research Center, has worked with 70 communities in 30 states to estimate the potential economic impacts of shifting growing and buying practices. Meter uses available data sources to quantify the economic inputs and returns of the current agricultural model in a region and contrasts that with food purchasing data from the same region.

This research began with a 2001 study of seven counties in southeast Minnesota commissioned by the Experiment in Rural Cooperation (aka Southeast Minnesota Regional Sustainable Development Partnership). In this initial study, entitled *Finding Food in Farm Country*, Meter calculated the following:

- 1) The 8,436 farms in southeast Minnesota sold \$866 million of farm products in 1997.
- 2) However, the region's farmers spent \$947 million raising these products. This is \$80 million more spent than they earned by selling their products.
- 3) These farms spent about \$400 million per year purchasing inputs and credit, mostly from distant suppliers.
- 4) Meanwhile, the 303,256 residents of southeast Minnesota spend \$506 million buying food, almost all from sources outside their region.

In the report, Meter summarizes: "As much as \$800 million each year flows out of our agricultural region." The region's 1997 total of \$122 million net farm income, averages to only \$15,000 per farm each year. Additionally, this income was essentially earned through rental income, custom service work, government payments, and investment income, not income from crop cultivation and animal husbandry (Meter, 2001). This study was updated and expanded in 2007 to include 15 counties in southern Minnesota, and the numbers tell a similar story.

In all communities analyzed, Meter suggests that a modest shift in growing choices of farmers and purchasing choices of consumers can result in significant economic impacts on local communities.

Extensive assessments on the impacts of local foods have also been conducted in Iowa. The Leopold Center for Sustainable Agriculture at Iowa State University received a directive from their state legislature in 2010 to complete an assessment on the potential for local foods and farms to create jobs. Their report, *The Iowa Food and Farm Plan*, includes 34 recommendations that could boost this sector forward. They estimate that local food production could create hundreds of jobs and have a \$62 million impact on the state.

In 2011, the Agricultural Utilization Research Institute (AURI) published a report for the Minnesota State Legislature that explored the potential for growth of the green workforce through food and agricultural industry in Minnesota. They estimate that the Minnesota food and farm sectors generate \$55 billion in economic activity in Minnesota and support more than 367,700 jobs. They conclude that emerging markets such as local food distribution, organics, urban agriculture and alternative farming techniques offer opportunities for small business ownership and employment.

MARKETS

To understand how southern Minnesota can benefit economically from local foods, it is useful to understand how dollars spent on local foods are distributed. Low and Vogel (2011) determined that about one quarter of local food sales were direct-to-consumer, which includes farmers' markets, farm stands, and community supported agriculture. The remainder of sales was through intermediated markets such as sales to retail outlets, restaurants, and distributors. They also

found that smaller farms were more likely to be engaged in local sales, but the large farms accounted for the largest quantity of local sales.

The following sections summarize information on local foods markets in southern Minnesota. They include: farmers' markets, community supported agriculture farms (CSAs), restaurant sales, campus and corporate dining services, farm to school, and grocery stores and supermarkets.

Farmers' Markets

From 1994 to 2011, the number of farmers' markets in the U.S. quadrupled from 1,755 to 7,175 (USDA-Agriculture Marketing Service Division, 2011). In Minnesota, there were 81 farmers markets in 2008 and by 2011 the number rose to 150.

While data on the economic impacts of farmers' markets in Minnesota is not available, studies in other states have shown positive economic benefits to communities and farmers alike. For example, in 2009, a group of organizations in Iowa surveyed vendors and customers at farmers' markets across the state to measure the economic impact of the industry (Otto, 2010). According to that study, Iowa farmers' markets generated \$38.2 million in sales in 2009, representing a 92 percent growth from 2004 when a similar study had been conducted. The analysis also concluded that farmers' markets in Iowa generate 576 jobs annually when indirect business and consumer-induced impacts are factored into the equation.

An interesting development in recent years has been the ability of low-income people to buy food at farmers' markets. The Farmers' Market Nutrition Program that serves low-income mothers, children, and seniors recorded \$500,000 in sales in 2010 at Minnesota farmers' markets (Smetanka, 2011). As of 2011, 44 farmers markets in Minnesota could accept Electronic Benefit Transfer (EBT) for the Supplemental Nutrition Assistance Program (SNAP) including the following markets in southern Minnesota: Albert Lea, Austin, Mankato, and Rochester.

Brown and Miller (2008) summarized additional studies that calculated economic impacts of farmers' markets and found that overwhelmingly farmers' markets have positive economic impacts on both vendors and communities.

Community Supported Agriculture Farms

In 1986, there were two Community Supported Agriculture (CSA) farms in the U.S.; today, there are over 4,000 (O'Hara 2011). The current Minnesota Grown Directory lists over 85 CSAs in Minnesota. While CSAs originally focused on vegetable production, more recently fruit, eggs, honey, baked goods, canned goods, cut flowers, and meat have become available through some CSAs.

CSA size varies widely, from those with a dozen members to those with several hundred members. A University of Kentucky study (2009) of CSAs in eight states (in the Midwest – but not including Minnesota) found that average CSA size grew from 59 patrons in 2007 to 89 patrons in 2009. Eighty-nine percent of the CSA farmers surveyed indicated that they marketed their products through other channels in addition to their CSA.

Brown and Miller's (2008) analysis of the limited research available on CSAs indicates that many CSA farms cover their operating costs, but not all of their labor costs. Additional information can be found at the Alternative Farming Systems Information Center within USDA which maintains a Community Supported Agriculture page on its website. This page serves as a clearinghouse for research, resources, and directories related to CSAs.

Restaurant Sales

Direct-to-consumer sales are not the only outlets where local foods have gained buy-in and market share. Since 2006, the National Restaurant Association's annual, nationwide chef survey has put local foods in the top 10 hottest trends in the restaurant business. In their 2012 survey of 1800 chefs, the top ten list not only included local foods, but included it four times—listing locally sourced meats and seafood, locally grown produce, locally grown wine and beer, and hyper-local as separate trends.

Minnesota has many restaurants that buy from local farmers. Within Minnesota, these restaurants are most dense in the Twin Cities metro area, but southern Minnesota includes a growing number: Pedal Pusher Café in Lanesboro, Sontes in Rochester, Amboy Café in Amboy, The Rainbow Café in Pine Island, and Nosh and Rabbit's Bakery in Lake City, to name a few.

While local foods are most evident in independent-owned restaurants, larger players in the restaurant business, such as Chipotle and Big Bowl, have also embraced local foods. Chipotle has gone so far as to partner with regional farmers to help them increase their production of certain crops in order to help Chipotle reach higher percentages of local foods in their restaurants (National Good Food Network, 2010).

The economic impact of farm-to-restaurant sales is not well documented in Minnesota. Anecdotal evidence suggests that restaurants are important markets for local farmers, but the value of those markets has not been quantified. Restaurants that promote their use of local foods appear to be thriving and receive extensive media coverage by food journalists.

Campus, Health Care, and Corporate Dining Services

College students, corporate workers, and hospital employees often rely on their campus dining rooms for meals. A 2010 survey of Minnesota State Colleges and Universities reported that 38 percent of these institutions purchase local foods (Center for Sustainable Building Research, 2010).

Bon Appétit Management Company, a division of Compass Group, has been a leader in local sourcing. In 2011, Bon Appétit contracted with over 1,000 local farms to supply their cafeterias and cafes across the country. They also employ 15 regional foragers who search out local foods for their operations (Bon Appétit, 2011). Within Minnesota, Bon Appétit Management provides corporate food service for Best Buy, Carlson Companies, Medtronic, Federated Insurance, and Target Corporation and manages dining services at the Minnesota History Center, Carleton College, St. Olaf College, Northwestern College, and Macalester. Other food service management companies have been slower to make widespread commitments to sourcing local foods, but their efforts are increasing.

This interest in local foods is not only coming from food service company management. College students have begun to organize across the country with the goal of changing their dining services. The Real Food Challenge is one such campaign that has a goal of campuses nationwide procuring 20 percent “real food” by 2020. “Real food”—by their definition— is food that “truly nourishes producers, consumers, communities and the earth.”

At some universities, the impetus for local foods has been within the context of educational outcomes. In 2009-2010 school year, Winona State University launched the Sustainable Foods Project—a yearlong initiative to increase awareness and understanding around sustainable food systems. This initiative included a winter farmers’ market on campus, a film festival, harvest dinners, and a number of opportunities to engage students and staff in visits to farms. Other colleges have student run farms and nearly all colleges and universities have at least one class that incorporates discussions on local food systems.

Farm to School

Farm to School efforts across the country have flourished in recent years. The National Farm to School Network estimates that 2,305 school districts participate in Farm to School representing 9,807 schools (National Farm to School, 2011).

The Institute for Agriculture and Trade Policy (IATP) and the Minnesota School Nutrition Association surveyed school food service directors in Minnesota. Their 2011 report states that 123 districts are participating in Farm to School. Seventy percent of the respondents purchased directly from a local farmer while 78 percent reported purchasing local foods through a distributor. Some districts reported purchasing up to \$25,000 in 2010. Fifty-five percent respondents indicated their intention to expand their Farm to School programs in 2011.

To estimate potential economic impacts of farm to school, a team of researchers from the University of Minnesota analyzed farm to school programs in Central Minnesota. Their study concluded that the annual economic impact in this five county region could range from \$23,000 annually for a monthly local meal to \$427,000 for sourcing large amounts of products easily adapted for food service. Easily adapted foods would include items like carrots, potatoes, hot dogs, and sweet corn that easily fit into the current menus (Tuck, 2010).

The IATP study reported that commonly cited barriers in starting or expanding farm to school are extra labor in preparation, price, and difficulty in finding farmers to purchase from directly.

Grocery Stores and Supermarkets

The majority of people buy food at a grocery store or supermarket near their home. Local foods are enjoying a renewed spotlight within supermarkets. *Supermarket News* identifies the “farm-to-fork journey” as number four on their list of important trends for 2012 (Lempert, 2011).

Throughout Minnesota, natural food co-ops have been leaders in sourcing local foods and must be acknowledged for the role they have played in providing markets for many local producers for over 30 years. In southeast Minnesota, a few co-ops and other retailers are paving the way for local foods sales including Just Food Co-op in Northfield, St. Peter Food Co-op in St. Peter, Lanesboro Local in Lanesboro, and Ferndale Market in Cannon Falls.

Other Minnesota-based grocery stores like Kowalski's, Coburn's, and Lunds & Byerly's have a history of buying from local producers and food makers, as does the nationally-based natural foods chain, Whole Foods. In the past year or so, HyVee, SuperValu, and Walmart have all begun to expand their purchasing of local foods.

Ironically, rural grocery stores have found it hard to compete with larger chains in nearby communities. Kansas State University launched a Rural Grocery Store Initiative with the goal of ensuring retail sources of food in rural Kansas. The initiative has amassed an impressive line-up of research, resources, and best practices to help rural grocery stores succeed in procuring local foods.

LOCAL FOODS INFRASTRUCTURE

Production

Minnesota ranks fourth in the nation for total crop cash receipts (Minnesota Department of Agriculture, 2011). While the vast majority is due to corn, soybean, and sugar beet production, there is a healthy and growing market segment for the products commonly known as “specialty crops”—which include all fruits and vegetables. The diversity of agriculture in southern Minnesota is wide and varied. Wabasha County, for example, ranks second in the state for fruit, tree nuts, and berries and 47th for soybean production, whereas Faribault County ranks third for corn and 67th for fruit, tree nuts, and berries.

Similarly, Minnesota ranks seventh for livestock cash receipts. This market segment is relatively evenly split between cattle, dairy, and poultry production with a slightly larger market in production of hogs. Martin County ranks first in hog production and Dodge County ranks first in milk production.

Like crop production statistics, livestock cash receipts represent a large amount of commodity, confinement, feedlot, or industrial-type production methods. These commodity products are more often sold into national and global markets through very large and well-known brands like Land-o-Lakes and Hormel. And, although the counties in southern Minnesota rank near the top due to these industrial-scaled agribusinesses, the region is also home to an impressive number of “local foods” businesses.

Two of the most recognized dairies producing on-farm bottled milk are in southern Minnesota: Cedar Summit and Kapper's Big Red Barn. Numerous grass-fed livestock operations and specialty crop farms operate in the region. Businesses like Thousand Hills Cattle Company and Featherstone Fruits and Vegetables supply relatively large amounts of local foods to nearby metropolitan markets. Thousand Hills products can be purchased in Cannon Falls, where they are located, at retailers throughout Minnesota and neighboring states, and at Super Targets in a multi-state area. A few very large apple orchards are also located in this region, including the largest certified organic tree fruit producer in Minnesota.

Data available from the Minnesota Department of Agriculture (2011) indicates that the cash value of agricultural activity in the SMIF region is about four billion dollars. It is difficult to

determine what percentage of that revenue is from “local” agricultural products and the data does not account for value added products.

What is known is that southern Minnesota is well positioned to grow in terms of local foods production due to its favorable climate, excellent soils, wealth of local expertise, and proximity to markets.

Processing

Minnesota is no stranger to food processing. In fact, three of the nation’s largest food processors are based in Minnesota: General Mills, Hormel, and Cargill. At the other end of the spectrum, Minnesota boasts some very small artisan processors who have won national awards in their sectors: Pastureland butter, Shepherd’s Way Farms cheese; and B.T. McElrath chocolates.

Meter and Rosales (2001) discuss the significant role of food processing in southeastern Minnesota. Twenty percent of the region's manufacturing income derives from food processing, and one third of all retail sales involve food. Adding value to locally-raised farm products and paying relatively higher wages than farm labor or retail sales, processing builds local wealth, but only to the extent local producers and workers earn adequate income or corporate ownership is locally held.

Understanding food processing in Minnesota is a complex endeavor. There are extensive data sets available that provide a wealth of information, yet there are gaps in the data, especially as it relates to smaller processors. What is clear across the processing industry is that the number of processors has decreased over time. Consolidation at the larger scale has put the bulk of processing into the hands of a few corporations. Because of economies of scale, these companies are able to process products at significantly lower costs than small companies. Although a few large corporations dominate processing (both in Minnesota and nationwide), small and mid-sized processors are playing an important role in local economies.

A broad array of products require processing to make them safe or marketable including meat, dairy, grains, vegetables, and specialty products like salsa, soups, and snack bars, to name a few. Beverages also make this list, including cider, juice, beer, wine, and spirits.

Meat Processing

In terms of meat processing, Minnesota is well positioned compared to many states. We continue to have many small and mid-sized meat processors that fit well under the local foods umbrella. An all-star in this sector is Lorentz Meats in Cannon Falls, who is nationally known for its work with local farmers and grass-fed meat products.

Minnesota has an active association of meat processors, the Minnesota Association of Meat Processors, and has excellent technical assistance in this area from the University of Minnesota’s Department of Meat Science, Agricultural Utilization Research Institute (AURI), and the Minnesota Department of Agriculture.

Dairy

The National Agricultural Statistic Services (NASS) conducts annual surveys in a number of sectors and provides access to its archived reports that go back, in some cases, to the 1920s. According to these reports, value-added dairy businesses have decreased dramatically in Minnesota.

Stellar examples of local dairy processing exist in Minnesota, but the number pale compared to neighboring Wisconsin. For example, Wisconsin had 126 cheese plants in 2009 compared to 11 in Minnesota. A few of the well-known business successes in southern Minnesota include Cedar Summit, Kapper's Big Red Barn, Hope Butter, Shepherd's Way, Alemar Cheese, and Faribault Dairy. Organic Valley, headquartered across the border in LaFarge, Wisconsin, is an important player in the Minnesota value-added dairy industry as a number of their farmers are based in Minnesota.

Support for businesses interested in value-added dairy is available through AURI, the University of Minnesota, and the Sustainable Farming Association of Minnesota. Wisconsin, however, provides much more robust support through its Value-Added Dairy Initiative (VADI) led by the Grow Wisconsin Dairy Team and the Dairy Business Innovation Center.

Fruit and Vegetable Processing

Processed fruits and vegetables are an important segment of the local foods market. Many institutions require minimally processed foods (washed, peeled, chopped)—as they lack facilities and staffing to prepare food within their facilities. Canning and freezing are also critical in making fruits and vegetables available out of season.

In some places, established businesses are filling this role. Sno Pac, a southeast Minnesota company, processes and freezes considerable quantities of vegetables and fruit. Lakeside Foods in Plainview cans and freezes vegetables and fruit under private labels. Distributors and food service companies, such as Bix and Winona Fruit, are involved in this segment of the food chain for products that go to institutions. According to the ReferenceUSA database, Minnesota has 65 enterprises that process fruits and vegetables and annual sales for these companies range from \$178,000 to nearly \$500 million.

Food hubs, which are described later in this report, are one option for enabling smaller farmers to aggregate their product for processing. Currently, processing options are better suited for large amounts of product. In some communities, kitchen incubators are being developed to offer space and facilities for farmers to process their products or for new businesses to get started. Additionally, some school districts are considering regional facilities as a means to increasing their ability to do more local foods and decrease their reliance on heavily processed foods.

Other Processing

Salsas, breads, tortillas, soups, and cereals are examples of some of the products that can be produced from local ingredients. While Minnesota is home to some of the largest food processors in the world, there are plenty of opportunities for small and mid-sized specialty processors.

Assistance for start-up businesses in this area is limited. AURI and the University of Minnesota offer some services, but they have limited funding to help these businesses. Many small business development entities do not have expertise in the food arena. There are interesting models across the country that can provide ideas for increasing support such as the Food Innovation Center run by Oregon State University, Mission Mountain Food Enterprise Center in Ronan, Montana, and The Intervale Center in Burlington, Vermont.

Aggregation, Storage, and Distribution

A frequently cited barrier to scaling up local foods is the lack of adequate, farmer-friendly systems to aggregate, store, and distribute product from the producer to the buyer. The term “food hub” has received a lot of attention in the past few years. The current system includes corporate models and farmer-led models. These models and the food hub concept are reviewed in the following sections.

Corporate Models

Sysco Minnesota, J & J Produce, Bix Produce, Reinhart Foods, and Ziebell’s are just a few of the food distributors who are Minnesota-based or have a presence in Minnesota. Some of these are very large companies and others are modest in size. Corporate-driven models have played an important role in the food system infrastructure, but have at times been a two-edged sword. On the one hand, the economies of scale and efficiencies to both producers and buyers are evident. Furthermore, the successful distributors have developed savvy ordering systems, timely delivery, and excellent customer service. The weakness in this model is its potential to fall backward into a “farmer-less” food system that skews benefits to the distribution company and has little room for small-scale producers. In a 2010 study of local food distribution models, Hultberg found that corporate distribution models pay the farmers significantly less than farmer-run distribution models.

While many distributors have sourced local foods for years, they recently have become more intentional about marketing these foods as local. They also have been more willing to work with growers to develop mutually beneficial agreements.

Cooperative Models

Cooperatives are another segment of the distribution sector: Co-op Partners, Organic Valley, Whole Farm Co-op, GROWN Locally (Decorah), and Fifth Season (Viroqua) are a few examples of cooperatives that aggregate and distribute products. Co-op Partners is owned by the Wedge Community Co-op in the Twin Cities and is the only one on this list that does not have farmers as members of the co-op. It purchases significant quantities of local food, as well other foods, and distributes to natural food stores, grocery stores, and restaurants in Minnesota and Wisconsin.

Organic Valley is a very successful farmer-owned co-op that is based in Viroqua, Wisconsin. Organic Valley works on a model of pooling local products within a region, and processing and distributing them regionally. Whole Farm Co-op, GROWN Locally, and Fifth Season are much smaller co-ops, and the latter two are in their early stages. Whole Farm, based in Long Prairie, aggregates, markets, and distributes products from thirty farmers in Central Minnesota.

Farmer-led Models

A handful of models exist in Minnesota that are not co-ops, but are farmer-led. Southeast Minnesota Food Network and Hidden Stream Farm are two examples in southeast Minnesota. Both aggregate product from local farmers and distribute it within the region and to Twin Cities markets.

Food Hubs

The term “food hub” has become a buzzword recently in the food system arena. According to the USDA, the working definition of a food hub is: *A centrally located facility with a business management structure facilitating the aggregation, storage, processing, distribution, and/or marketing of locally/regionally produced food products* (Barham, 2011). The examples mentioned above may pass as food hubs. One key goal of a food hub is to enable smaller producers to access markets that require larger quantities than they can or want to produce alone. The USDA conducted a survey of 45 individual food hubs in January 2011. The number of farms supplying those food hubs averaged 77 and the average workforce per food hub was around 17, split between full-time, part-time and volunteer workers. In 2010 the average food hub had sales of \$3.7 million (Barnham, 2011).

Entrepreneur Assistance

The pioneers of the local food movement, many who are still active, have been innovative, committed, persistent individuals. They built this sector on a strong set of values about farming, food, and community. They did not have an easy path, and were often swimming upstream without much in the way of technical assistance. While some businesses did not make it, others, like Organic Valley, Lorentz Meats, and Sno Pac are thriving.

To ensure that this sector continues to thrive, high-quality assistance must be readily available. This includes assistance with business planning, marketing, research and development, and financing.

On the farm-to-market side, farmers have offered their peers training and assistance through farmer associations such as the Minnesota Fruit and Vegetable Growers Association and the Sustainable Farming Association of Minnesota. Assistance has also come from the Minnesota Department of Agriculture, the University of Minnesota (Extension, Minnesota Institute for Sustainable Agriculture, Regional Sustainable Development Partnerships, College of Food, Agricultural and Natural Resource Sciences), technical colleges and a variety of nonprofits: Midwest Organic and Sustainable Education Service, the Land Stewardship Project and The Minnesota Project, and more recently Rural Advantage, the Institute for Agriculture and Trade Policy, Renewing the Countryside, the Minnesota Food Association, and the Rural Enterprise Center, to name a few.

In terms of value-added products, assistance has been less abundant. AURI has provided an array of assistance on specific products, but the availability of this assistance has ebbed and flowed in relation to their funding. The University of Minnesota has provided some assistance through their food science and nutrition program, their meat science program, and The Food Industry Center.

Further business assistance has been scattered. Cooperative Development Services has been a key player in providing business planning assistance to a number of food businesses, with a focus on cooperatives. A few economic development entities have provided assistance to local foods based businesses. The Winona Economic Development Authority has been very active in this area recently, and developed an excellent report on opportunities for local foods development in their county. Dodge County is studying the feasibility of a local food hub within their county.

Industry associations also play an important part in this arena. The Minnesota Association of Meat Processors is one example of a group that provides resources and connections for meat processing businesses in Minnesota.

Financial Assistance for non-commodity farms and food-based businesses is an area that requires more exploration. A study by Caroline van Schaik (2003) found that smaller, diversified farms in the region had difficulty accessing loans from banks. The Carrot Project in Massachusetts found similar issues for small farms. Some recent efforts are promising, such as Farm Service Agency providing more loans to non-commodity farmers, and other lenders offering programs for beginning and young farmers.

FOOD SAFETY AND REGULATION

Food safety has increasingly become an area of concern for consumers, businesses, farmers, and food makers. To ensure a safe food supply, the government is expanding regulations. At the same time, some companies in the private sector are requiring a variety of certifications from their suppliers. For instance, some food service companies require that their purchasers source only products from GAP (Good Agricultural Practices) certified farms. Farmers and food entrepreneurs alike have to be aware of the local, state, and federal regulations and the requirements of their customers.

There is general agreement from both businesses and regulators that regulations are developed with an eye to the large players in the food system. The fallout of this “one size fits all” approach is that small businesses have difficulty implementing new requirements in a cost effective manner.

An area where additional assistance is needed is in helping farmers and food entrepreneurs navigate and understand food safety regulations as well as helping them learn how to implement them in the most efficient and cost-effective way. While information and assistance is available through regulatory agencies, higher education, private consultants, and nonprofits, it isn't always easy to access or understand.

PLANNING AND POLICY

Planning is an increasingly important factor in local food systems, and occurs at various levels: township, city, county, state, and federal. The American Planning Association, an independent non-profit educational association for certified planners, formed a Food Interest Group in 2005 to consider and address issues across local, regional, state, and national food system scales. They

define community food system planning as “the collaborative planning process of developing and implementing land-use, economic development, public health, and environmental goals” (American Planning Association, 2011).

Planning efforts across the country have ballooned in recent years. The *Journal of Agriculture, Food Systems and Community Development* released a special issue in Fall 2011 entitled “Planners Coming to the Table.” This special issue of the journal examines examples across the country where planners are thinking about food systems in their work.

Within Minnesota, several regions have become involved in food system planning:

- Northeast Minnesota conducted a Northland Food and Farming Initiative that included a regional/community food system assessment.
- The City of Minneapolis launched “Homegrown Minneapolis” – a multi-year effort to look at how the city could improve the local food system – included assessing the situation and determining where changes were needed. This included food access, farmers’ markets, economic development, processing, and regulation. This effort has led to the development of the Minneapolis Food Policy Council that was launched in January 2012.
- Ramsey County and the City of Saint Paul launched the Saint Paul - Ramsey County Food and Nutrition Commission, which serves to educate the public about healthy foods, make urban farming feasible, and make food access a reality for all county residents.
- Dakota County instituted a Farmland and Natural Areas Preservation program to preserve key farmland and natural areas from development pressure.
- The Southeast Minnesota Foodshed Planning Initiative (SEFPI), a project of the U of MN Experiment in Rural Cooperation, has been collecting information and data on the food system in southeast Minnesota and recently helped launch a regional food systems working group.

SUMMARY

This portion of the project has provided an overview of the local foods sector through the lens of papers and reports on the subject. It is the first phase of an initiative exploring local foods as an economic driver in southern Minnesota. The following sections include interviews with farm, food, and economic development professionals in the region in order to begin to develop links and resources that can foster growth in the local foods sector.

PART 2: FOOD AND FARM ENTREPRENEUR INTERVIEWS

This phase of the research involved interviewing farm and food entrepreneurs to better understand the realities of working in this sector within the southern region.

METHODOLOGY

Identifying Food and Farm Entrepreneurs

To identify businesses to interview, we asked key individuals from the region and from the sector for their recommendations. In short order, over 100 businesses were suggested. Of these, 25 were contacted, and 21 responded and agreed to be interviewed.

The businesses contacted represent a range of business types, ages, sizes and locations: Sno Pac Foods has been in operation in Caledonia since the early 1900s whereas Alemar Cheese Company in Mankato has only been in business for three years. People's Food Cooperative in La Crosse, Wisconsin and Rochester, Minnesota has 120 FTE employees whereas LaBore Farms has 1.25 FTE. One business had annual sales at \$40 million whereas the smallest business had not surpassed \$100,000 gross sales.

Retail food stores, a restaurant, a food service company and a range of farmers and processors were among those interviewed. A list and map of the businesses can be seen in Figure 1.

Interview Process and Format

An initial email was sent to potential interviewees requesting an interview. Interviewees were told they would receive a \$35 stipend to participate in the interview. The \$35 was a token amount to acknowledge their willingness to share their expertise and experience. A date and time was identified by email or phone. The interviewer either traveled to the location of the business or called the interviewee on the phone at an agreed upon time. Interviews lasted from 45 minutes to 1.5 hours.

Interviewees were told the goals of the research were twofold:

- 1) to better understand of what types of investments, resources, and assistance would benefit local food businesses in the region; and
- 2) to get input into what would need to happen to significantly increase production, processing, purchasing and consumption of local foods in the southern region.

Figure 1. Interview Map



Meat

- A) Thousand Hills Cattle Company
- B) Lorentz Meats
- C) Ferndale Market
- Q) Hidden Stream Farm
- T) Rural Enterprise Center

Flour Mixes/Grains

- J) Whole Grain Milling

Other

- D) Sweet Harvest Foods

Dairy

- F) Cedar Summit Dairy
- H) Shepherd's Way Farms
- E) Alemar
- R) Plainview Milk Products

Retail

- I) St. Peter Food Co-op
- K) Lanesboro Local
- O) People's Food Cooperative

Produce

- L) Sno Pac Foods
- M) Hoch Orchard
- G) LaBore Farm
- N) Featherstone
- P) Bushel Boy Farms

Restaurant/Food Service

- S) Pedal Pusher Cafe
- U) Bon Appétit, Carleton

A semi-structured interview format was used to conduct the interviews. This format provided a framework for the interview, while allowing flexibility to adapt the interview as additional topics arose. Questions were designed to get a general understanding and history of the business, to learn what has worked for them in the sector, what hurdles they face, and who and what have been helpful. They were also asked about inputs, markets, employees and financing. Appendix A provides a complete list of the interview questions.

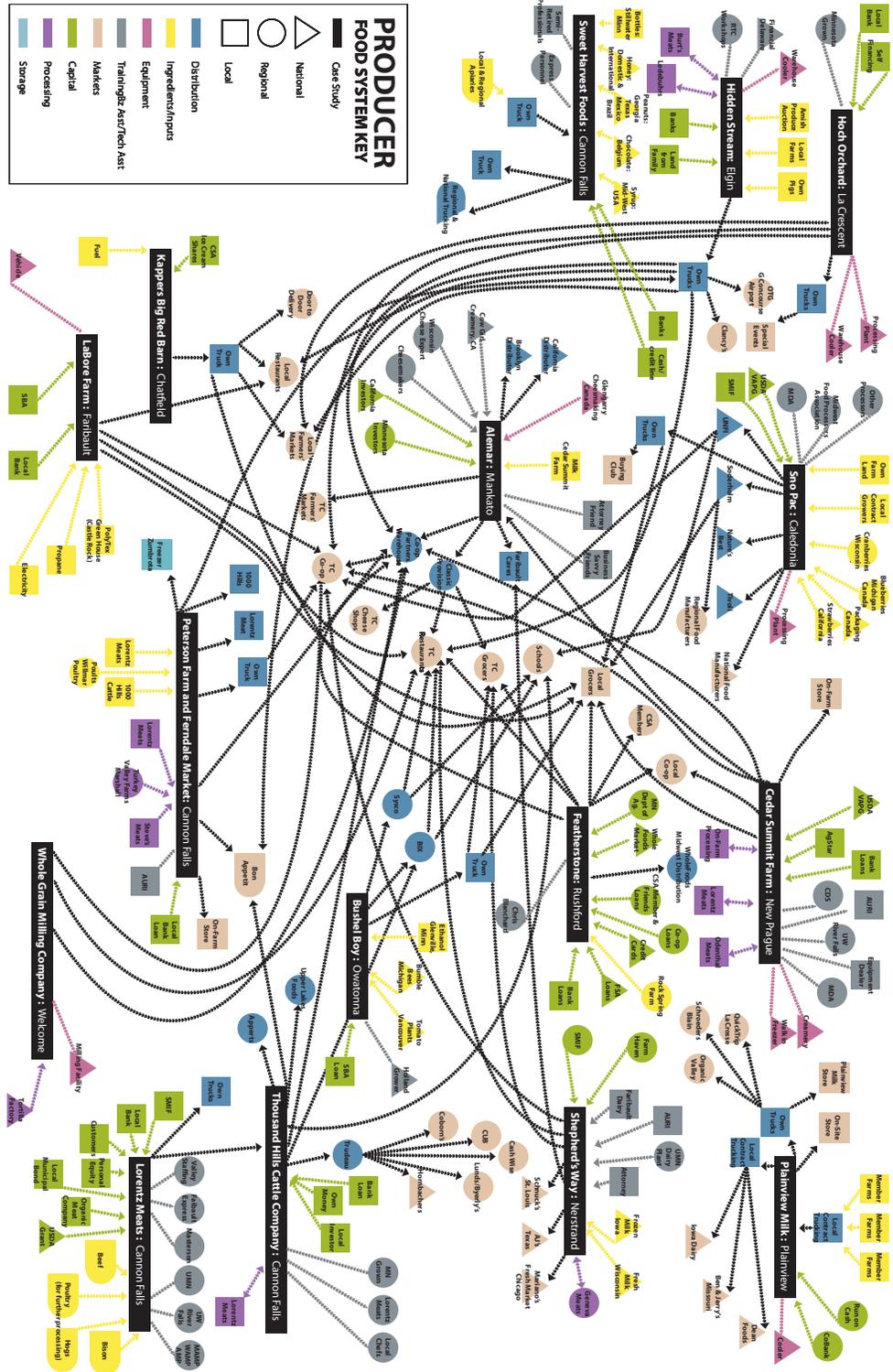
When the interviews were conducted in person, the interviewer took notes by hand and later transcribed those into an electronic format. Notes were typed directly into a word document when interviews were conducted by phone.

Analysis

Interview transcripts were analyzed with two goals in mind. The first goal was to diagram the relationships mentioned by interviewees in terms of suppliers, distributors, financing entities, markets, etc. The expectation was that this diagram would shed light on how various businesses in the area are connected. It is available on the following page.

A second goal of the analysis was to identify key themes and observations within each interview and to compare those themes across interviews. The following sections of this document present these findings.

Diagram 1. Interrelationships



MARKET ENVIRONMENT

Growth in Demand for Local Foods

Without exception, the businesses interviewed indicated that they have seen the demand for local foods rise in the past five years. These businesses anticipate continued growth, and for most, the demand surpasses the supply they are able to provide at their current capacity. The general manager of the St. Peter Food Co-op said, “Local food has always been a cornerstone of our business model. And while growth has been steady, in the last five years people have really started seeking out local products and that has driven business to us.”

The owners of the Pedal Pusher Café in Lanesboro credit their decision to focus on local foods as key to their business success. They said, “With the recession, people started changing the way they saw their money and started looking to invest locally. We had 30 percent growth. There is no question that the reason we’ve been successful the last couple of years is because of our focus on local.”

Another business owner said, “Slowly but surely people are getting more interested in where their food comes from.” He went on to say, “It remains to be seen if there is a tipping point or if it is a slow evolution.”

Interest in local food is evident in different segments of the marketplace including:

- Direct markets (on-farm stores, CSAs, farmers markets)
- Institutional food service (that services colleges, corporate campuses, hospitals, etc.)
- Retail grocers (food co-ops, independent grocery stores, national grocery chains)
- Restaurants
- K-12 schools
- Manufacturers (to be packaged and branded or as ingredients in other products)

In addition to interest among these market segments, interviewees mentioned a few other things they thought helped to increase interest in local foods. This included coverage in Twin Cities and regional magazines, food co-op newsletters, newspapers, and food blogs. Michael Pollan’s provocative books (e.g. *Omnivore’s Dilemma*, *In Defense of Food*) and his writings in *The New York Times* were mentioned. One interviewee said that Pollan’s appearance on Oprah got the attention of the more mainstream grocery stores he sells to. Food films, such as *Food, Inc.* and *Fresh*, were also mentioned.

Others noted that growing concern over health issues has impacted interest in local foods. Increases in food allergies and concerns about chemicals in food were two specific items mentioned.

Market Influences & Challenges

Throughout the interviews, Twin Cities’ food co-ops were mentioned as early and key customers who have helped drive interest in local foods. Those who live in Minnesota may not be aware of the uniqueness of the natural foods cooperative sector in Minnesota. Natural food co-ops have been selling local foods since their inception in the Twin Cities in the 1970s. As they have grown and matured, so has their buying power and influence. There are 12 member-owned co-ops in the

Twin Cities with 14 locations and collectively they have more than 60,000 member-owners. Interviewees mentioned that being featured in co-op newsletters and sampling their products in their stores has helped grow interest in their products and in the sector as a whole.

Restaurateurs and chefs who promote and support local foods were mentioned as important figures in the system. These individuals have not only been reliable buyers, but advocates for local foods. Because of the spotlight they receive from the media, these chefs have a broader influence on the public. They also influence their sous chefs and other staff who go on to take jobs with greater responsibility at other restaurants.

A number of colleges and universities buy significant quantities of local foods. Bon Appétit was identified as an important customer by several interviewees. Bon Appétit is the food service management company for Carleton and St. Olaf Colleges in Northfield, MN; as well as Northwestern College and Macalester College in St. Paul, Medtronic, Carlson Companies, Federated Insurance, and Best Buy. Ease of working with large food service companies varies. Bon Appétit was praised for understanding the reason behind sourcing locally, and for making it manageable for producers to work with them. Interviewees indicated that other food service companies are more difficult to work with because of excessive paperwork and contracts with broadline distributors that prevent the food service companies from doing more local and direct sourcing from producers.

Farm to School efforts have blossomed across the state, but they too, come with their own set of challenges. One producer said, “Working with a school system is very involved. Schools have stringent nutritional guidelines, lean budgets, and preparation limitations. In addition to that, they have to appeal to kids’ tastes.” Federal funding through Minnesota’s Statewide Health Improvement Program (SHIP) has helped schools source and promote local foods. Limited cooking facilities and tight budgets make this a challenging, albeit rewarding, market for producers.

Related to this, interviewees commented on the value of an internal advocate within an organization. Sales into larger institutions, e.g. schools, groceries, or colleges require an internal advocate who can lessen or help navigate bureaucratic hurdles and can help promote the product.

Interviewees pointed out that more mainstream businesses are showing an interest in local foods. HyVee, Target, and Cub were a few of the retailers mentioned. One interviewee reported, “The store manager at our local Cub Foods says that they are hearing from the top down that if you have foods that are special to your area, you should bring them in.” Other interviewees had a “wait and see” attitude as to whether these larger chains would continue their interest in local foods.

Thousand Hills Cattle Company, which has been a star in the local meat movement, made some waves when they started selling into Target. While they understand the criticism, their perspective is: “We want more people to have access to quality food, wherever they buy their food. This means that local foods need to get into more mainstream markets.” From an operational standpoint, selling to Target means finding more farmers in the region to raise meat using Thousand Hills’ protocols. It also means maintaining an efficient logistics and

communication system throughout their supply chain in order to fill the weekly order for 70 stores. Their representative noted, “When you’re supplying such a large company, you can mess up once, maybe twice, but never three times.”

Most of the businesses interviewed mentioned their own marketing efforts as critical to their success. Minnesota Grown was mentioned by several producers as an important partner in this effort, providing cost-effective marketing and cost-sharing. Building relationships with customers was noted as a vital aspect of marketing, whether they are patrons at farmers markets, buyers at retail stores, or manufacturers looking for ingredients to further process..

Regional Differences

According to most of those interviewed, the bulk of demand for local foods comes from the Twin Cities metro area. While interviewees noted there was some interest for local products within their own and neighboring communities, the demand pales in comparison to the Twin Cities market.

Several reasons were suggested for this difference. Some interviewees associated this with the abundance of white-collar jobs—and thus more disposable income—in the Twin Cities. Others observed that Americans generally have a “cheap food” mentality, but the Twin Cities, with its concentrated population, has enough people who are willing to pay a higher price. Even a business interviewed that has good sales at their rural, on-farm store credits their success to Twin Cities’ transplants. They said, “Our main customers at our store are people who have moved to this area from the Twin Cities.”

While local sales may not be robust, many of those interviewed make an effort to have their products available within their community. They do this through a variety of means, including working with retail partners, selling to buying clubs, and sales at local farmers’ markets. In Mankato, the local Cub store sells Alemar Cheese. In Cannon Falls, Ferndale Market carries Thousand Hills beef, Lorentz sausages and Sweet Harvest’s peanut butter. Sno Pac, one of the larger companies interviewed, goes out of its way to service small retailers and buying clubs in their community.

Specialized products, like artisan cheeses, required a wider market to be successful. Artisan cheesemakers rely on a tiny sliver of the overall cheese market. Their customers are people who are willing and able to pay very high prices for a specialty product. Less specialized products can reach the sales volumes they need to be profitable in regional markets, as was the case with the produce and meat producers interviewed.

Defining Local

In the first section of this document, it was indicated that there is no agreed upon definition for local foods. While local foods certainly have a geographical component, for some the term encompasses implications that reach beyond geography.

Minnesota is rich in food corporations and therefore residents of the state are likely consuming more Minnesota grown and/or processed foods than they realize. For instance, most local dairy companies—Kemps, Schroeders, Old Home—buy milk from the region to use in the products

they sell within the region. Kwik Trip and Dairy Queen also buy local milk. Kwik Trip bottles and sells it under their Nature's Touch label and Dairy Queen turns it into Dilly Bars and Blizzards.

Green Giant has always used some Minnesota vegetables in its products, and now has the Le Sueur brand of frozen and canned vegetables that come from Le Sueur, Minnesota, the birthplace of Green Giant. It is likely that a portion of the ingredients in General Mills and Hormel products also come from Minnesota and surrounding states.

While we acknowledge these examples as geographically local, it is important to understand that local has other connotations. In fact, over half of the individuals addressed the “local foods” terminology even though it was not one of the interview questions.

Generally, interviewees who identify themselves as established players in the local foods sector suggested that the term “local foods” is more than a geographic measure. They suggest that there are additional attributes that local foods encompass including transparency in the supply chain, a connection to the producer/producers, and a level of integrity and authenticity. The following are a few selected quotes from the interviewees:

“If distance is the only attribute you look at, it misses a lot of what the customers understand as local. We differentiate by values within the supply chain: living wage jobs, humane treatment of humans, and ethical treatment of animals. In the commodity system everything is driven by lowest cost, so everyone tries to take advantage of each other.”

“Hormel and General Mills are locally-based, but we’re talking about something different — something that has transparency and has differentiated practices. The term embodies more than just geography.”

“If local is just about geography, then Pepsi is very local. It is bottled in South St. Paul using 99% local ingredients: water.”

“While we source very locally, we are glad that Sysco is providing information about where their products come from. So for the products we can’t get locally, like cut-up chicken, we can at least choose Golden Plump chicken from St. Cloud over chicken from Georgia. It is still industrial chicken, but it is moving closer to what we want.”

“Whether I’m sampling foods in the local co-op down the road or in a store in Cambridge, Massachusetts, what everyone says is, ‘I like to buy local,’ — even though, in Cambridge, they know my product is produced 1300 miles away. They have bought into the fact that it is local because they are dealing directly with the producer. They know whom they are working with, and where the product comes from. I think that is what people are talking about when they talk about local foods.”

“Local varies from product to product. In Minnesota, local meat is fairly easy. For local veggies – I’d go to a farmers market, my garden, a CSA, or look for a local label at the grocery store. Local really matters when I have options available.”

“As a business that has sold local foods for a long time, we ask ourselves how we hold on to the local story and not have it co-opted by something that doesn't have the same integrity.”

One business interviewed, that does not self-identify as being part of the local food sector, indicated that they originally tried to source 100 percent locally but found that they could not do that and grow their business. Their sources come from as close as a few miles away to as far away as Asia. Markets for their products also are wide. These entrepreneurs suggested that there is value in looking at local in terms of where a company is located and how it supports its employees and its communities.

Nearly all of the businesses interviewed source some of their inputs from beyond the North Central region of the U.S., whether it is their equipment, energy inputs, or product components. This is especially true for full service grocery businesses and restaurants that need to be able to source a mix of products year round to be competitive.

As SMIF determines its strategy for working in the local foods sector, it will be important to find ways to acknowledge and address the differences noted within these interviews. The grassroots energy lies strongly within the more nuanced definition of local foods, where a connection exists to the farmer or food producer. But embracing this definition of local does not mean that all things multi-national and corporate are bad. Rather, it suggests the need for a continuum of businesses in the food sector.

Various means of differentiating businesses include:

Locally owned-----	Non-local ownership
Grown locally -----	Grown elsewhere
Made locally-----	Made elsewhere
Retain farm/farms of origin connection -----	Source not traceable
Differentiated practices (e.g. organic, fair-trade, etc.)-----	Conventional practices

BUSINESS CONSIDERATIONS

Production

Production was identified in the interviews as an important component of a successful business. A number of businesses, from vegetable farmers to meat processors, mentioned the extensive knowledge required to run their businesses. Growing thousands of pounds of carrots and getting them to market is no easy task, nor is making cheese, processing beef, or feeding thousands of customers. The “know how” to succeed in these businesses has involved trial and error, assistance of mentors and advocates, and, in some cases, putting formal education and training to work in the real world.

Many of the businesses interviewed identified seasonal patterns. For example, demand for artisan cheeses and fresh turkey goes up during the winter holidays. While most of the products made or grown by those interviewed are available year round, fresh produce is the most challenging due to Minnesota’s weather constraints. Two businesses interviewed are able to supply produce year

round by the use of greenhouses. Another business overcomes this barrier by freezing fruits and vegetables. Cold storage of root crops is a strategy another business uses to extend the season.

Perishability of products is a challenge some businesses face. Whether it is produce, dairy, or meat, products that can spoil require particular care. Businesses must maintain a balance between supply and demand and have efficient and accurate logistics in place. Failure to do so can mean a costly loss of product. In instances where buyers and sellers have good relationships, buyers may be willing and able to buy excess product when there is surplus and make substitutions if supply is low.

Energy prices were mentioned as a concern by most of the businesses interviewed. For some businesses, low natural gas prices have benefited them temporarily, but they do not anticipate these prices will last. One interviewee criticized the Minnesota Energy Mandate as hindering his competitiveness because it increases his energy costs, making his product more expensive, and thus less competitive. Other interviewees see promise in renewable energy sources. One interviewee had recently installed solar panels to decrease his energy costs. Several businesses mentioned an interest in geothermal options for heating. The barriers to energy efficient options and renewables are the upfront costs to purchase and install them.

Production almost always includes the use of equipment, whether it is farm equipment, or equipment needed to produce value-added products. Interviewees mentioned the cost of equipment as an issue. The capital investment needed to purchase equipment, either new or used, is a barrier that sometimes hinders expansion.

High land prices were also mentioned as a barrier to production. Finding affordable land to rent or buy is difficult in the current marketplace. This makes it particularly difficult for new and beginning farmers to get started. It also makes it difficult for established farmers to expand their operations.

Finally, all businesses must consider their waste streams. Waste or byproducts can be costly to dispose of or they can generate revenue. While the waste stream was not a focused part of these interviews, it did come up in several of the interviews. The most interesting example was in Cannon Falls where byproducts of poultry farming and meat processing are recycled by two area businesses. One business incorporates turkey manure into an organic fertilizer. The other business uses byproducts from turkey and beef processing to make raw dog food.

Distribution

In discussions among food system advocates on scaling up the local food system, distribution is often brought up as a bottleneck. The majority of food and farm entrepreneurs interviewed were able to find or develop adequate distribution systems. The caveat is that most of their product is distributed to the Twin Cities, which is a simpler undertaking than distributing it to small cities and towns in the region.

Eleven of the businesses interviewed have their own vehicles that they use to deliver at least some of their product. Some make daily deliveries while others only deliver periodically. A few businesses work together on deliveries. This was particularly evident in Cannon Falls where

Thousand Hills Cattle Company, Lorentz Meats, and Ferndale Market often share freight and transport products to and from warehouses for each other.

In Elgin, Hidden Stream Farm has developed an aggregation and distribution system. While Hidden Stream primarily raises and sells pork, their customers are interested in additional, locally grown products. Hidden Stream takes orders from their customers and then works with local producers to fill those orders. Products are delivered to the Hidden Stream warehouse, where they are then loaded and delivered to customers, primarily in the Twin Cities.

Distributors and trucking companies also play a role in distribution. Some of the businesses interviewed contract with independent truckers for various needs, such as collecting milk from dairy farmers or delivering grain to and from a processing center out of state.

A number of distribution companies were mentioned as important partners, including Bix, Classic Provisions, Trudeau Distributing, Alberts/UNFI, Soderholm, Tivoli, Reinhart's, and Co-op Partners. Artisan cheesemakers had additional distributors, from as far away as California and New York, who focus only on cheese. None of these businesses are located in southern Minnesota, but all play a role in the distribution of products either within the area or to outside the area.

Thousand Hills Cattle Company, whose first markets were through Twin Cities food co-ops and chefs, indicated that Trudeau Distributing, based in Burnsville, Minnesota, has become one of their largest customers. Trudeau is a specialty foods distributor that services independent food retailers and national supermarket chains across the Midwest. They were not interested in carrying Thousand Hills beef products until one of their customers requested it. Now they supply over 100 grocery stores with Thousand Hills beef. Thousand Hills benefits because Trudeau doesn't just distribute their product; they also make the sales calls, take orders, invoice the customers, and pay Thousand Hills directly.

Faribault Caves was mentioned by two artisan cheesemakers as a valuable partner. Faribault Caves lets small cheesemakers piggyback on their orders. The cheesemakers deliver to Faribault Caves, who distribute their products, along with their own cheeses, to buyers across the country.

Bix Foods, based in St. Paul, does both distribution and light processing of produce. As none of the produce farmers interviewed do any processing, this partnership is critical for making sales to restaurants, schools, institutions, or groceries that want to access local produce, but don't want to clean it, peel it, or cut it up themselves.

Among the distributors mentioned, Co-op Partners was credited by many as being a key resource in the local foods sector. Owned by the Wedge Community Co-op in Minneapolis, Co-op Partners is an aggregator and distributor of natural and organic foods. They supply many of the co-ops in the North Central region as well as other grocers and some restaurants.

Co-op Partners has two modes of working with producers. One mode involves purchase of products from producers, which Co-op Partners then sells and distributes throughout their service

area. This enables producers to get their products into regions they would not be able to service themselves, such as Northern Minnesota, Wisconsin, Iowa, North Dakota, and South Dakota.

The second mode is a drop/ship service. If a producer wants to sell directly to a customer, the producer can make the sale, deliver the product to Co-op Partners warehouse with an invoice, and Co-op Partners will deliver the product to the customer for a small fee. Co-op Partners also will pick up products from farms on their routes and bring them to their warehouse (i.e. backhaul) to be distributed to customers. Ironically, it is often more cost effective for a farm or food business in southern Minnesota to deliver their products to Co-op Partners and have Co-op Partners distribute it back to neighboring communities in southern Minnesota than for the businesses to deliver directly to their neighboring communities. Full trucks are more energy and labor efficient than small trucks carrying limited amounts of product.

One of the natural food co-ops interviewed said:

“Co-op Partners revolutionized getting local product into our store. It not only helped us, it helped farmers. Even for farmers 25 miles away, they can’t necessarily justify delivering to our store. It doesn’t pencil out in terms of transportation costs. It may not make sense intuitively, but when you run the numbers you see it is more efficient and uses less energy to use the more circuitous route.”

A producer who sells directly to food co-ops in the Twin Cities mentioned a similar view. He explained, “I had to work with the co-ops to get them to understand that while they like a reliable supply, I need a reliable customer. Some co-ops wanted to ‘spread the love around’ among producers, which sounds good, but makes it hard to survive in this business.” For this grower, he needed to sell enough volume to make it profitable to transport his products to the Twin Cities.

A few of the businesses interviewed sell their products to large corporations who then distribute them to their own stores. For example, Thousand Hills ships its products to a Target Corporation warehouse. From there, Target distributes the products to its own stores throughout the central corridor of the U.S. Whole Foods Market makes a weekly pickup during the growing season at Featherstone Farms and moves that product to a warehouse in Indiana, where it is distributed to their stores across the region.

Access to Capital and Financing

Access to capital is important for all businesses, and the businesses interviewed as part of this project were no exception. Needs for capital ranged from building expansion and equipment costs to operating costs. Three-quarters of the enterprises interviewed expressed that accessing capital had been or is an issue for them.

Reasons Capital Is Hard to Access:

- Lack of equity
- Non-traditional businesses (thus banks lack confidence in the business model)
- Lack of track record or experience in business
- Capital least available when needed most
- Loan programs through Farm Service Agency are tailored for commodity crop farmers, making them very difficult to navigate for alternative crop farmers

- Lack of mechanism to match businesses with capital needs to investors or financial institutions willing to invest or loan

Those with equity in land, buildings, or personal savings reported having an easier time accessing loans. One interviewee said, “Traditional lenders have an institutional bias against alternative agriculture and food businesses. There is no ‘blue book’ formula to tell them exactly what to expect.” Businesses who struggled to access loans initially found that once they were established and profitable, it was much easier to access additional capital.

A number of businesses indicated that what they really needed was patient capital. Traditional debt financing, while helpful, also comes with requirements to start paying the loan off immediately, which can be challenging. One business spoke of how SMIF had been instrumental in their success because they had allowed them to delay payments for six months on a large loan they received a number of years earlier. Cash flow had been an enormous issue at the time, and SMIF’s forbearance enabled them to get over that hurdle. Today, they are at an entirely different level financially, and that act of patience back in the early 2000s is remembered as an important factor in their survival.

Other businesses noted that an influx of capital would help them to grow their operations. Several indicated that they would like to add greenhouses, processing, or storage, but they do not have the resources to make these capital-intensive investments.

A few businesses suggested that accessing capital too easily is a risky proposition. One interviewee observed that having “skin in the game” increases a business owner’s motivation to work hard and make their enterprise succeed. That said, this same individual thought there needed to be balance.

Capital Raising Strategies

Several enterprises have developed or participated in innovative financing models to help them raise the capital needed for special projects or special situations:

The owner of Alemar Cheese Company had been in bankruptcy from a previous business, so was not able to access loans. He developed a business plan, pitched it to prosperous friends, and was able to raise the capital to get his business up and running.

Featherstone Farms raised capital from CSA (Community Supported Agriculture) members, customers, and friends of customers to add solar panels to their cold storage warehouse. They also received a 1603 grant from the federal government for the project. Whole Foods Market, one of Featherstone’s key customers, gave Featherstone a \$100,000 operating loan.

Kappers Big Red Barn sold CSA shares of ice cream in order to raise capital to buy ice cream-making equipment.

Lorentz Meats looked into industrial development bonds to capitalize the expansion of their facility in Cannon Falls. While they found a national bank that would carry the bond,

they had wanted their family, friends, and local banks to be able to buy into it. In the end, they went with conventional debt financing.

Shepherd's Way Farm formed Farm Haven, which is a separate entity that raised nearly a million dollars of investments for the farm.

Both People's Co-op and St. Peter Food Co-op have successfully raised capital from member owners. The St. Peter Co-op, for example, raised nearly \$900,000 from member owners to build a new store.

Federal and State Grants and Loans

A few of the enterprises interviewed have successfully accessed grants or loans through federal and state programs. These include:

- Cedar Summit Farm received a USDA Value Added Producer grant in 2012
- Bushel Boy received a USDA Value Added Producer grant in 2009
- Sno Pac Foods received a USDA Value Added Producer grant in 2007
- Featherstone Fruits and Vegetables received a U.S. Federal Treasury Grant and a low interest loan from the Minnesota Department of Agriculture for the installation of solar panels.
- St. Peter Food Co-op qualified for a USDA loan guarantee, which made it easier for them to qualify for a loan from their bank.
- A couple of the smaller businesses interviewed had qualified for SBA backed loans.

A number of interviewees indicated that they have heard that loans and grants are available through state and federal programs for which they might qualify. However, most also noted that they do not have the time or expertise to identify the appropriate programs or to apply. One interviewee said:

“There needs to be some kind of grant writing clearinghouse or financial clearinghouse that would make it easier for producers to access the information and expertise needed to put this all together: something like pro-bono grant writers. Farmers and food makers don't have the time and expertise to crack into the resources that may be out there. Accessibility is huge. It's not just information—but matchmaking. There is a lot of information and a lot of resources—but tracking down the right ones is the trick and small entrepreneurs don't have the time.”

One interviewee expressed concern that grants and low interest loans might give an unfair advantage to his competitors.

Infrastructure

While interest in local foods is growing, lack of infrastructure continues to be a barrier, according to a number of the interviewees. This is especially a problem within institutions. One interviewee said, “Many schools lack cooking facilities. They have the desire to do more local foods, but they can't with their current facilities.”

Other interviewees commented on the need for more storage and processing of local produce to make it available year round. Featherstone Farm has recently expanded its storage facilities onsite and sees storage and processing as the future for the farm. Buyers also mentioned an

interest in adding storage so they can buy crops when they are abundant and use them at a later time.

Sno Pac, the only company interviewed that freezes food, said, “In Minnesota, we need to look at frozen for vegetables. Fresh produce only works for six months out of the year.” They went on to say, “There is a lot of interest in starting to process vegetables, but it is a complex business. It is not like opening a video store. There are lots of considerations and regulations.”

Human Resources

Those interviewed had mixed results in finding the types of workers they needed. Businesses with more entry-level jobs seemed to find the available labor force adequate. Those looking for more skilled workers, or workers willing to work “farmer hours,” found it more challenging to find good employees. One interviewee said, “There are the dreamers and there are the locals, and neither have the work ethic we need. They want to be done at 5 pm and have weekends off.”

Another business indicated that the applicant pool is slim for jobs that require more skills. To compensate, they look for people with basic management skills and a little passion, and then provide them training. This approach has been successful and many of their managers have risen from the ranks. A few businesses indicated that this was an approach they have taken, by bringing on employees who have promise, and training them to take on more responsibility. Another interviewee thought that the lack of available skilled workers was a result of a high availability of jobs with good wages in the southeast part of the state, making competition for employees high.

Several businesses mentioned that staffing services have been helpful in their business. One interviewee said, “While we pay 20% more to have these folks [from a staffing service] on payroll, it saves so much time and energy. If they send someone who isn’t a good match, we tell them and they send us someone else.”

A few businesses that offer benefits to employees talked about the cost of health care benefits. Costs have skyrocketed and where businesses used to fully cover the insurance plans, they now share the cost with the employee.

Research and Development

Research and development (R&D) is challenging, but critical, for small businesses. The challenge is not a lack of ideas, but rather a lack of financial and human capital needed to invest in it.

All of the businesses interviewed do some R&D, but those with stronger financial and human resources are able to accelerate these efforts. External support for R&D has been limited. The Value Added Producer Grant (VAPG) was mentioned as helpful to some of those interviewed. The Agricultural Utilization Research Institute (AURI), the University of Wisconsin River Falls Dairy Processing Division, and the University of Minnesota Dairy Plant and Meat Science Department were the few resources mentioned. Others mentioned private individuals within their field who provided input and advice. A few interviewees indicated their industry associations had been helpful when trying to develop new products or technologies.

Regulations & Insurance

While all industries must abide by certain regulations (e.g. OCIA and ADA-Americans with Disabilities Act), food businesses also have to consider HACCP (Hazard Analysis and Critical Control Points), GAP (Good Agricultural Practices), and state and federal guidelines. A number of interviewees spoke about the challenges of regulations, both government-mandated and buyer-mandated. While most had worked hard to abide by regulations, there were some who pointed out that most regulations are developed with large companies in mind and they become obstacles for smaller companies. One individual said, “Food safety requirements, whether they are coming from the government or from the buyers, will put mom & pop shops out of business. Whole Foods wants to see two years of GAP audits and \$5 million in liability. You have to have a good reputation to find an insurance agent to insure you at that level.”

Smaller entities that market to more independent buyers (independent restaurants, food co-ops, and grocery stores) reported that so far, food safety regulations did not have an impact on them. Those who had previously worked with regulators had mixed experiences. Most of the businesses interviewed worked very hard to try and do things by the book and work with regulators on the front end of building a new facility, or developing a new product. There were a few issues with regulators that were mentioned. One business thought that because they were small, they were given more scrutiny than larger businesses in the same industry. Others were pleased with the relationships they had with regulators and found their regulators to be very helpful.

Regulations can be especially confusing and intimidating for new businesses. There is some training available regarding regulations, but the quality of the training seems to vary based on who is providing it.

Competition

Size is a factor for most of the businesses interviewed. The majority of the companies interviewed would qualify as small businesses, according to the Small Business Administration standards. While the public loves small businesses in theory, in reality it is a difficult sector in which to succeed. As one interviewee said, “We’re a smaller company competing in a big world.”

Consolidation is another issue. One company interviewed developed a value-added product that relied on high-lysine corn. They purchased seed for this corn from a family-owned company. That company was bought out by a larger company, which was then bought out by an even larger company, which stopped producing the seed variety. This put the company needing the seed in a difficult position because there were not other ready suppliers of this type of seed.

Another business in the region faced a similar hurdle when their butter maker decided they wanted to develop their own competitive product, and stopped making this business’s butter. This resulted in an enormous problem for the company, which resorted to traveling to Wisconsin to have their butter processed. This issue was the first in several that resulted in the demise of the company.

For small businesses without a lot of financial and human resource depth, these kinds of issues make them very vulnerable.

On a more positive note, several companies indicated that their customers have helped them out in tough times and they have repaid the favor. Other interviewees noted that they have received support from people within their own industry.

Support

Interviewees were asked who or what had been helpful in their business. Their answers included mentors, savvy friends and colleagues, other businesses in their industry, customers, media, industry associations and trade shows, and advocates within food service (chefs, restaurateurs, and colleges).

Several organizations and universities were also named. They include (in alphabetical order):

- AURI (product testing)
- Chamber of Commerce (Lanesboro)
- Cooperative Development Services (feasibility studies, grant writing)
- Institute for Agriculture and Trade Policy
- Land Stewardship Project (distribution efforts, training new farmers in business)
- MN Department of Agriculture/Minnesota Grown (promotion, cost-share on demos, loans)
- Minnesota Institute for Sustainable Agriculture (education)
- National Cooperative Grocers Association (education, peer-to-peer networking)
- North Country Co-op Development Fund (loans)
- Renewing the Countryside (farmer/buyer workshops, Green Routes)
- Southern Minnesota Initiative Foundation – (grants, loans)
- University of Minnesota, Dairy Plant and Meat Department (R&D)
- University of Minnesota Extension (education)
- University of Wisconsin River Falls (R&D)
- USDA Specialty Crop Block Grant Program (grants)
- USDA Value Added Producer Grant

RECOMMENDATIONS

Strong Regional Advocates

Several interviewees noted that if the Mayo Clinic were on board with local food efforts, it would have a huge impact on the region. One interviewee said, “If the quality of food in Rochester matched the quality of health care, it would have a dramatic change on the region.”

Public Education

Many interviewees noted that public education was critical to improving the success of the local foods sector. As was noted above, demand for local foods within the region has not been nearly as strong as in the Twin Cities. Most interviewees noted that people in the region are either unable or unwilling to pay the higher price for local foods.

Interviewees talked about the public's expectations in being able to access "cheap food." While it seems that food grown locally might cost less because it doesn't travel as far, that is generally not the case.

One interviewee explained, "Our commitment to participate in a value chain where all members in the chain are treated fairly means that the end cost of our products is higher than that coming out of the conventional food system." Another interviewee mentioned that he cannot compete on price with imported products coming in from countries where workers are paid a fraction of what U.S. workers are paid. Add to that fewer regulations in many countries, from environmental regulations to food safety, and it translates to locally grown produce being more expensive.

Another interviewee said, "Sometimes watermelon will be cheap, other times it will be more expensive. If the only thing that matters is price and predictability, local foods will only go so far."

A number of interviewees thought that despite this difference in cost, demand for local foods could grow in the region with the right education. One interviewee said, "What would help is a well-trained public. The right messages need to be in the media and the public needs to be savvy enough to know when the messages are authentic and when they are being tricked (green-washed)."

Another person said, "We need to help shift people's choices. It may cost a bit more to buy local, but you're helping your neighbor and your community." And another said, "Educate around the benefits of local products and why the cheapest price shouldn't be the driver."

Needs and Challenges: New Businesses

Interviewees shared thoughts for new businesses in the food and farm sector.

- **Experience.** Does the individual have the skills and knowledge in the area of interest, and if not, what are the means by which they can gain these?
- **Compatibility.** Does the individual have the personality and drive to succeed in the business?
- **Scale.** What is the goal? Some interviewees noted that it is important to understand the goals of food and farm entrepreneurs. They noted that some people are looking at their enterprise as a lifestyle choice and may or may not expect it to be their sole source of income. Others may envision a business that is of a larger scale, where their business can make a dent in the community and the marketplace. The assistance needed by these different types of entrepreneurs will vary.
- **Capital.** Where can start-ups access capital? For farm-based businesses, access to land, either to lease or buy, is a challenge.

Several interviewees circled around an issue that one of them captured in this quote: "At the end of the day, it doesn't matter how right or nurturing you are, you have to be able to run the business. Some people assume that the virtue of their endeavor will sustain it—and it doesn't. The business needs to work. At the end of the day—the airplane has to fly."

On a similar vein, a couple of interviewees mentioned there has been a lot of interest recently in new models and new endeavors. While they appreciate this interest, they expressed concern that these new models may look good on the surface, but may not be backed up by workable business

plans. One interviewee stated, “It seems that a lot of time and energy is being put into start-ups, whereas it might be wise to put some of that money and time into established small businesses that want to expand.”

Interviewees had a range of advice on what it takes to be successful in this sector. They include:

- Find the gaps. Grow or develop a product that is desired but not well represented.
- Price your product correctly.
- Aspire to make something great rather than something average.
- Connect people to the story behind their food.
- Provide excellent customer service.
- Be able to adapt to what customers want.
- Stay ahead of the pack.
- Be excellent at sales.
- Treat customers as partners.
- Understand the complexities of running a business, including the regulatory, insurance, and legal aspects.

Mentors were highly recommended by a few interviewees. One said, “Find other people that you can learn from and who can serve as mentors.”

While a number of resources were mentioned as useful, the Land Stewardship Project’s Farm Beginnings Program stood out in terms of training new farmers. One buyer said, “LSP’s Farm Beginnings is turning out a whole different type of farmer, one who knows how to sell food into retail stores. That has made it so much easier for us.”

Needs and Challenges: Established and Growing Businesses

The businesses that have undergone growth, are in the midst of growth, or are planning for growth identified things that would have been, or would be helpful to them.

Several interviewees, when asked what would help local foods businesses to succeed, talked about the need for better systems of support. As businesses undergo growth and move to a larger scale, they face new issues, and may not have the skills or staff resources to address them. These businesses would benefit from some type of executive support that could provide assistance, coaching, and guidance in scaling up a business.

One company is working to develop this type of system internally. Sweet Harvest Foods Management Company recently split their company into four companies, with the management company overseeing Sweet Harvest Foods Company, a processing company; Mel-O Honey Inc., an import and marketing company; John Mountain Organics; and PB Crave. The management company provides services to the other companies including sales, human resources, customer service, and supply chain management. They were able to find the expertise they needed to do this by finding semi-retired professionals with years of expertise. With this model they hope they will be able to foster the development of “intrepreneurs,” that is employees who have an entrepreneurial vision and want to be innovative within the company.

A couple interviewees recommended a business service center focused on businesses in this sector. An issue these businesses face is that typical venues for getting business assistance, e.g.

Small Business Administration (SBA), SCORE, and economic development organizations are generally not familiar with the local foods sector. A service center could provide industry-specific expertise and assistance with human resources, marketing, access to capital, financial analysis, accounting, distribution, and supply chains, among other things.

A couple interviewees suggested a peer-to-peer network of businesses in this sector. The successful peer-to-peer network among food co-ops was mentioned as a model. Many natural food cooperatives in Minnesota are part of the National Cooperative Grocers Association. This association takes on activities across its membership and provides its members with a range of resources and assistance. One interviewee explained, “Having the national group do promotions and things that all stores would do frees us up to focus on local things and things we are passionate about. Some people think it makes us more like a big business. I think it helps us become a better small business.”

PART 3: INPUT FROM REGIONAL PROFESSIONALS

This part of the research involved surveying farmers’ market managers and economic development professionals in the region to gather their input on the local foods sectors.

FARMERS’ MARKET MANAGERS SURVEY

Methodology

Farmers’ Market managers were surveyed as a means of understanding issues and opportunities facing farmers selling into local foods markets. Twenty-three farmers’ markets were identified through Minnesota Grown, Local Harvest, and the Minnesota Farmers’ Market Association.

A survey questionnaire was developed and posted online through Survey Monkey. Market managers were contacted by phone, when a phone number was available, told about the project, and asked if they would be willing to complete an online survey. Seventeen managers completed the survey. The information is summarized below:

Market Location and Size

The following chart summarizes the location of the markets that responded, the number of customers each market sees on an average market-day, and the number of vendors at each market.

Market	Population	Customer #s (avg)	Vendors	Est. Gross Annual Sales
Albert Lea Farmers’ Market	17,401	unknown	35	\$275,000
Austin Area Farmers’ Market	22,981	200	28	\$100,000
Eyota Farmers’ Market	1,798	100+	10	unknown
Gaylord Farmers’ Market	2,108	62	12	\$15,000
Hayfield Farmers’ Market	1,336	30	7	unknown
KEE Town & Country Centre	472	5		\$300
La Crescent	4,900	150	25	unknown
Lake City	5,289	175	12	unknown
Lanesboro Farmers’ Market	724	200	15	unknown
Mankato Farmers’ Market	36,500	1000	24	unknown
New Prague	6,791	70	9	unknown
Plainview Farmers’ Market	3,240	200	9	\$40,000
Preston Farmers’ Market	1,320	25	8	\$16,000
Rochester Downtown Farmers’ Market	106,769	3750	99	\$2,200,000
Mabel, Simple Living Farmers' Market	710	unknown	18	unknown
Winona Farmers’ Market	26,502	200	45	unknown

Products Available

Market managers were provided a list of products and asked which ones were available at their market. All of the markets indicated that they had vegetables and bedding plants available. Most of the market had fruits, baked goods, canned goods, eggs, honey, and maple syrup. Some of the markets had chicken, beef, and pork. A few markets had dairy products and bison.

Demographics of Customers

Market managers were asked what type of residents or community members shopped at their farmers markets. Six market managers mentioned older residents. Four mentioned young and middle aged adults and young families. Three mentioned newcomers or tourists. Four responded that there are a variety of customers. Albert Lea mentioned immigrants. Rochester mentioned women. Those who indicated older residents tended to represent towns with smaller populations (<7,000).

A few notable comments include:

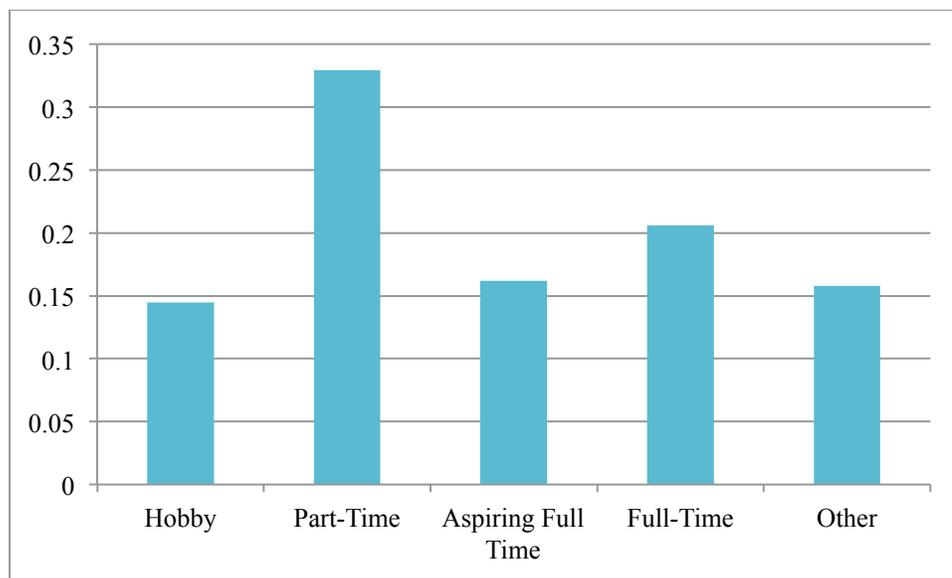
“Late 20 to early 40 somethings make up a large segment of our market, but we have a very diverse mix of people attending every week.”

“10 years ago it was mostly retirees who came to our market, now the majority are parents with young families to people in the 40-60 age group.”

Type of Farmers

Managers were asked about what types of vendors they had at their markets. They were provided with the categories of hobby farmer (just doing it for fun), part-time farmer, full-time farmer, aspiring full-time farmer, and other from which to select. The market managers indicated that the majority of vendors were part-time farmers, with a fairly even split between the other categories. The distribution is shown in Figure 2.

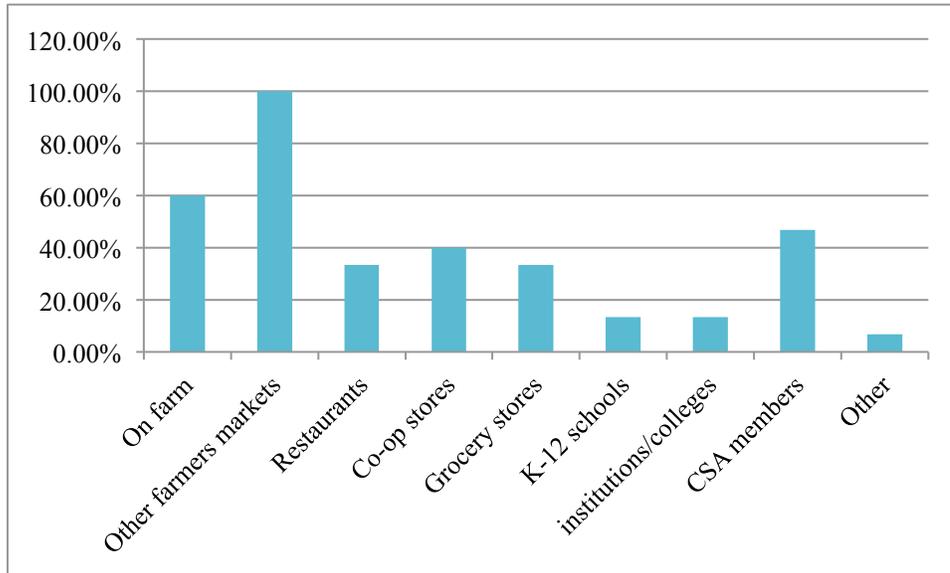
Figure 2. Types of Farmers Selling at Farmers’ Markets



Other Markets for Farmers

Managers were asked to identify other markets where their farmers sell their products. The most mentioned other markets were other farmers' markets, on farm, and through Community Supported Agriculture (CSAs). The distribution is presented in Figure 3.

Figure 3. Other Markets



Barriers to Growth

Managers were asked what sorts of barriers their vendors experience in terms of expanding their operations or accessing other markets. Common responses included cost of inputs such as labor, land, and equipment, and lack of money, time, and sufficient markets (customers, demand for local products). State laws and regulations, advancing age of vendors, and lack of interest in expanding were also mentioned.

Training and Assistance Needs

Market managers were asked what percentage of their vendors needed assistance in the following areas: production, food safety, post-harvest handling, direct marketing, wholesale marketing, developing marketing materials, financing, leasing land, buying land, accessing operating capital, accessing overhead capital, processing, and distribution.

Interestingly, market managers tended to be split on whether or not their vendors needed this training and assistance. Five respondents indicated that less than 10 percent of their vendors needed any of this training (the lowest option provided). Three respondents indicated that 75 to 100% of their vendors needed training and assistance in all the categories provided (the highest option provided). Seven respondents had varying answers for each type of training. One respondent left the answer blank.

Respondents identified post-harvest handling, direct marketing, and developing marketing materials as the areas of the highest need for vendors. The majority (thirteen) of managers did not think that many vendors would benefit from processing or distribution assistance, but three

managers (of larger markets) thought that most of their vendors would benefit from this type of assistance.

Perspectives on Increasing Interest in Local Foods

Market managers were asked, “What do you think needs to happen in order to create a stronger interest and participation in local foods in southeast/southern Minnesota?”

Most managers mentioned a need for public education and awareness around the value of local foods (12) and a need for more advertising and marketing for producers and local food initiatives (6). One respondent mentioned that it would be nice to find a way to reward consumers who do choose to source food locally. Another mentioned transportation as an issue. One mentioned a need for processing facilities to make it easier to provide local products year round. One also mentioned reducing restrictions imposed by the state agricultural department on growing and processing at small scales. Another mentioned the need for a network of sharing best practices and resources with other market managers. The answers appeared to be similar across the different sized cities.

Summary

The high response rate to this survey seemed to indicate a real interest and commitment among the market managers. Because of their positions as market managers, it is not surprising that the area where they saw the most need was in marketing local food and building public awareness around the value of local foods. Their split on answers related to technical assistance needs of vendors suggests that there may not be a clear understanding of what vendors do and do not need. Vendors selling mainly at farmers’ markets would be less likely to need some of the assistance mentioned than those interested in selling into wholesale markets.

ECONOMIC DEVELOPMENT PROFESSIONALS SURVEY

Methodology

Economic and business development professionals in the region were surveyed to gather their input on the local foods sector in the communities in which they work. SMIF provided a list of 234 contacts who work in business and economic development in their 20-county region. Emails were sent to 142 individuals on this list. (Thirty-three names on the list did not have email addresses and fifty-nine names were a second or third person within an organization already on the list. Of the emails sent, 5 of the email addresses failed, 19 people provided responses, and 10 people indicated they would send a response in the near future, but did not.

Due to time limitations, only one email was sent requesting information. A more rigorous effort may have resulted in more responses.

The email communication to economic development professionals included a definition of local foods. It said:

For the purpose of this research, I'm broadly defining local foods businesses (farms included) as those that:

- 1) make or sell products that contains ingredients that are grown or raised in

- Minnesota or adjacent states; OR
- 2) make or sell products that are differentiated in the marketplace because they are made in Minnesota; OR
 - 3) make or sell products that are differentiated in the marketplace because they are made with local ingredients.

The definition of local foods was kept purposely broad. The survey contained three questions. The answers are summarized below.

Local Foods Businesses

The first question asked what businesses and institutions work in the local foods space in the respondent's community? For example: restaurants, cafes, processors (butchers, creameries, packing houses), community kitchens, grocery stores, food co-ops, schools, farms that sell direct, artisan food makers, distributors.

The answers to this question were instructive and demonstrated the incongruence in the understanding of "local foods," even though a definition was provided. Some respondents understood "local food" to mean food that can be purchased locally, and thus identified multi-national fast food chains and all places food can be purchased in the community as local foods outlets. Others understood local food to mean food that was grown and/or processed in the community and identified farmers, food makers, farmers' markets and grocery stores that buy from local producers. A number of respondents said they were not sure who used local products.

Businesses identified by respondents are listed here. They represent a broad range of businesses. Not all would be considered local foods by the definition provided in the survey.

Albert Lea Select Foods	Farmer's Market (2)	Odenthal Meat Market
Alemar Cheese	Food co-op	Pisoma Kitchen
All Season's Community Services	Franke's Bakery	Pizzeria 201
Anderson Custom Processing	Fred's IGA (2)	Poet Ethanol Plant
Angie's Kettle Corn	Gainey Conference Center	REG Bio-diesel Plant
Arndt'sy's	George's City Meats	Reinhart Food Service
Bella Ciao Catering	Harvest Food Co-op (2)	Schmidt's Meat
Blooming Prairie Elem. School	Highway Roost	Schultz Family Foods
Blooming Prairie High School	Hilltop Meat Market	Schultz Farm
Boys & Girls Club	Holy Redeemer Catholic School	Schwan's
Buffet King	Hope Creamery (2)	Schwartz Farms
Burger King	Hy-Vee (2)	Schweiss Meats
Bushel Boy	Jordahl Meats	Seneca Food Corporation
Cargill	Jubilee Fruits & Vegetables	Souba's Farms
Casey's	Kenyon Meats	St. Peter Food Co-op (2)
Central Café	Lakeside Supper Club	Steve's Meat Market – Ellendale
Central Valley Cooperative	Local farm producing honey	Subway (2)
Christensen Farms	Local vineyard	Taher, Inc
Clinton Falls Farm (2)	Lucky's Dressings	Terry's Foods
Conger Meats	Mankato Farmers' Market,	The Bakery
Country Pleasures	Marshall public schools	The Servicemen's Club
County Fair	Maynard's of Mt. Lake	Pizza Cellar
Dancing Winds B & B	Montgomery Farmers Market	Vandal's Foods
Daniels Restaurant	Montgomery Orchard	Vernon Center Meat Market
Del Monte Foods	Mrs. Gerry's Kitchen	Village Café
Edel's Meat Market	Nelson's County Market	Walmart (2)
Erdmans County Market (2)	Nick's Meats	Zumbro River Brands
	Numerous butchers	

The answers suggest that there is opportunity for education and outreach to economic development professionals as well as businesses in the region to strengthen their understanding of the local foods sector.

Local Capacity in the Food Sector

The second question asked about the capacity within the respondent's community related to the food sector? For example: storage (cold storage, warehousing), community kitchens, transportation companies, processors, packaging fabricators, wholesalers, distributors, staffing companies.

Commonly mentioned types of businesses included:

- Cold storage
- Warehouses
- Packing companies
- Trucking companies
- Staffing services
- Industrial processing facilities
- Butchers/local meat processors
- Canning companies

One respondent noted that they have a community kitchen in their local incubator. Two respondents indicated that local churches had commercial grade kitchens. One respondent noted that their community had a root cellar in the old state school and wondered if it could be restored for community use.

Assistance Available to Food and Farm Entrepreneurs

The third question asked what sorts of assistance is available to food and farm entrepreneurs within the respondent's community?

Five respondents did not know of any assistance available and three respondents did not answer this question. The remaining eleven respondent's answers included:

- Local EDA - assist with finding programs, technical assistance, business plans, marketing, GAP financing, perhaps other incentives if located within city limits
- SBDC - consulting
- SCORE
- SBA Financing
- USDA Financing
- U of M Extension Office
- Minnesota State University, Mankato
- AgStar Financial Services
- AURI (Agricultural Utilization Research Institute)
- Value Added Producer Grant from USDA
- Land Stewardship Project Beginning Farmer Program.
- Kenyon EDA Revolving Loan Program
- Energy Efficiency Loan Program through Kenyon Municipal Utility

- Flood funds through DEED
- City obtained grant funds
- CEDA (Community and Economic Development Associates)
- County revolving loan program
- Potentially other economic development tools such as tax abatements to assist agriculturally related businesses.

It would be interesting to explore this information further to understand how these resources have been used specifically to support the local foods sector. Some of the resources suggested by economic development professionals were also noted by entrepreneurs, but other of these resources were deemed less useful by entrepreneurs.

Summary

Economic development professionals can be tremendous assets in helping to grow local foods businesses in the region. Because of the low response rate and the nature of the questions, it is unclear as to their level of interest and their capacity to provide the type of support needed. A few respondents were very interested in this area and had a good grasp of the issues and opportunities. Others seemed less familiar with the concept of a local foods sector outside of the conventional systems working within their communities.

PART 4: FOOD SECTOR MAPPING AND DATABASES

The goal of this phase of the project was to understand what data and information resources are available that can help to match local foods based entrepreneurs with services and assistance.

As a starting point, we sought to identify local foods businesses in the region. Information was available from the Minnesota Department of Agriculture's (MDA) Minnesota Grown directory that includes information on farms and farmers' markets where the public can buy directly from farmers. MDA also has a wholesale database for producers and foodmakers who have wholesale products available. The Regional Sustainable Development Partnerships (RSDPs) maintain an online map that includes producers, retailers, processors, and restaurants.

The information through Minnesota Grown is quite accurate, as producers have to sign up annually. However, producers must be members of Minnesota Grown to be included in the directory, and pay a small fee, so the directory is by no means comprehensive. Furthermore, it exclusively features producers and not other sectors of the food system. The RSDP map has representation from more segments of the food system (i.e. restaurants, processors, etc.), but the data points are not regularly updated and the quality of the data sources vary. It is clear from viewing the RSDP map that many sectors have incomplete information.

The most extensive source of local food system data identified was the Minnesota Department of Agriculture licensing database. This database is regularly updated as producers and businesses apply for licenses related to selling food. It includes all producers who are part of Minnesota Grown, but also grain buyers, livestock buyers, dairy plants, retail food businesses, wholesale food businesses, and many others. It does not, however, include food-related businesses licensed by the Minnesota Department of Health, such as restaurants, caterers, hospitals, and schools.

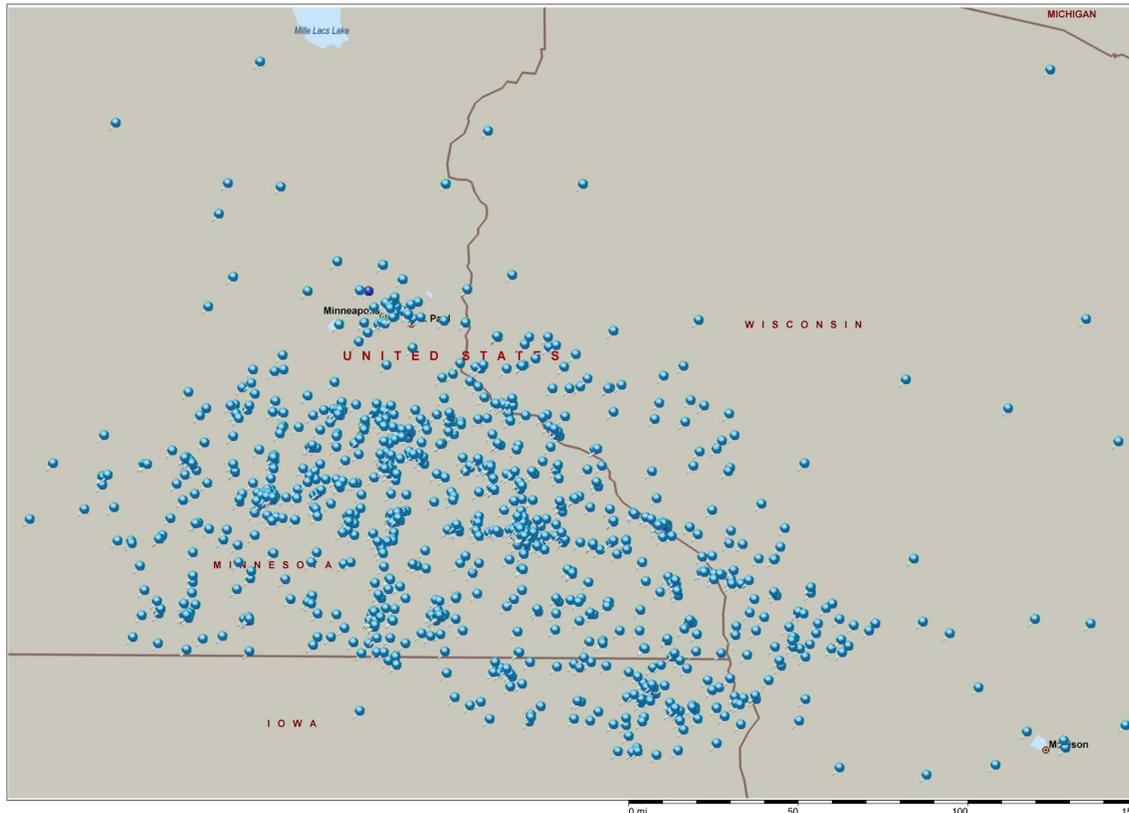
While extensive, the businesses included in the MDA licensing database are not all good matches with a local food system definition. For instance, office supply stores and movie theaters come up on the list, because they do sell some food items.

An attempt was made to create a map using the data from these sources. Additional lists were added to the master list including suppliers to Lanesboro Local, Ferndale Market, People's Food Co-op, and the St. Peter Food Co-op. Data was pulled from the MDA licensing database in the categories of cultured dairy plant, dairy plant, farmstead cheese, food broker, general merchandise warehouse, Minnesota Grown labeling, retail dairy food handler, retail food handler, retail mobile food handler, wholesale food handler, wholesale food processor/manufacturer, and wholesale produce dealer.

Businesses in the MDA licensing database were coded using the following system. Businesses were given a two if they were very likely to have a role in the local food sector, a one if they might have a role, and a zero if they were unlikely to have a role. The coding involved making educated guesses about many of the businesses. It seemed reasonable to give a two to all the businesses listed under Minnesota Grown Labeling, but it was less obvious as to whether a retail food handler should get a zero, one, or two. In these cases, some quick web research was done and a number was assigned.

Finally, all of the lists were merged into a master list. Only those businesses that received a one or two from the MDA database were added to the master list. The final number of businesses on the master list was 1,546. These were then mapped using Microsoft MapPoint. The map is shown below in Figure 4. It should be noted that each dot can represent multiple businesses, as the software merges all businesses with the same zip code into a single dot.

Figure 4. Mapping of Food Businesses



The usefulness of this map is limited. It provides a snapshot of the local food system. The master list of businesses could be used as a starting point for outreach or to gather additional information from these businesses. It should be noted again, however, that the list does not include, for the most part, businesses that are licensed by the Minnesota Department of Health.

Available Tools

A search was undertaken to identify tools that help, or could help, link businesses in the local foods sector with the supplies and services they need. While a few tools exist to link buyers to sellers of local food products, such as Minnesota Grown, LocalHarvest.com, and LocalDirt.com, few resources exist that make business-to-business connections.

Two tools were identified. One is MarketMaker, a system developed at the University of Illinois and now in use in 19 states. MarketMaker contains an extensive collection of food industry data pulled from various data sources. Producers and food businesses can register and add data about their own business. The stated goal of MarketMaker is to help connect farmers to markets and

develop “quality driven supply chains.” Some evaluation has been done on this tool and results have been positive, but only marginally so. For instance, a study completed by Zapata et. al. in 2011 found that agricultural producers estimated an average increase in sales of \$121 because of their participation on MarketMaker.

Another tool is TRADIRS, a database maintained by the Minnesota Department of Agriculture. This database includes information on processors, wholesalers, food handlers, and many other businesses. At a meeting on May 24, 2012, MDA staff indicated that the database was in need of updating, but that discussions were underway to possibly revamp TRADIRS to bring it up-to-date and make it a more useful resource.

CONCLUSION

The local foods sector has experienced significant growth in recent years and the information reviewed for this report suggests that it will continue to grow robustly. This provides opportunities for entrepreneurs within this sector and for communities who can provide the support and incentives to grow and attract businesses in this sector.

Southern Minnesota is well positioned to grow the local foods economy in the region. From a natural resources perspective, the region has rich soils, abundant water, and a decent climate for growing many products. From a knowledge perspective, the region has a breadth of farm and food industry expertise and is already productive in this sector. From a market perspective, southern Minnesota has growing cities and towns, but is also close to larger metropolitan areas that can serve as important markets.

While naturally well positioned, there are opportunities to accelerate the growth of the local foods economy in southern Minnesota. New and existing businesses need access to affordable, effective technical assistance; they need to be able to access appropriate financing; and they need assistance in understanding and implementing food safety protocols. At the same time, communities need to be amiable, knowledgeable, and supportive of this sector. They need to embrace new businesses and be open to change.

APPENDIX A

Understanding Supply Chains

Because of the complexity of food systems, it is useful to have some visuals. The Hudson Valley Agribusiness Development Corporation (HVADC) developed an excellent publication entitled: *Understanding Food Systems: Identifying business opportunities for Hudson Valley Farmers and Food Entrepreneurs*. We've adapted their illustration of the food chain. Figure 5. shows the flow of products and capital through the food systems.

Figure 5. Flow of Products and Capital Through Food System



The HVADC report is helpful in that it outlines the structure of local, regional, and global supply chains. It also diagrams the difference between direct versus intermediated sales and breaks those down into the following:

Direct Market Retail

- farmers' markets, roadside stands, public indoor markets, CSAs, pick-your-own operations, and door-to-door

Direct to Market Wholesale

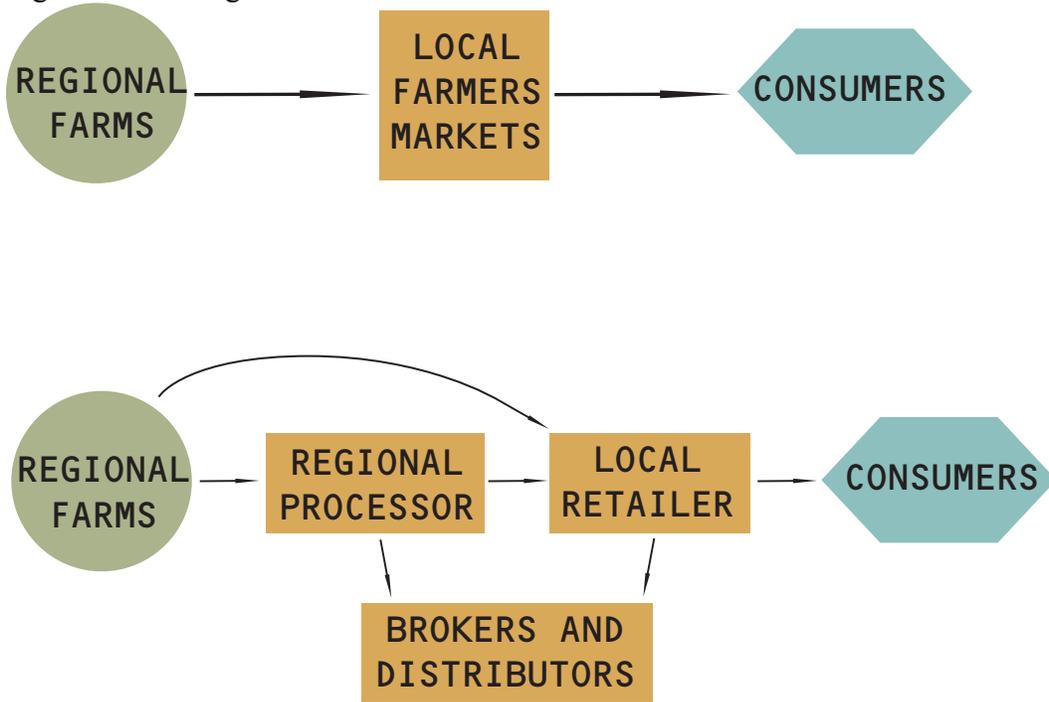
- direct-to-store-delivery, farmer-to-farmer exchange, farmer-owned processing and marketing, public (wholesale) markets; cooperative marketing; and private sales force

Intermediated Marketing

- cooperative and association marketing; manufacturing; brokers, dealers and manufacturers representatives; distributors and logistics providers; packers and shippers; food wholesalers

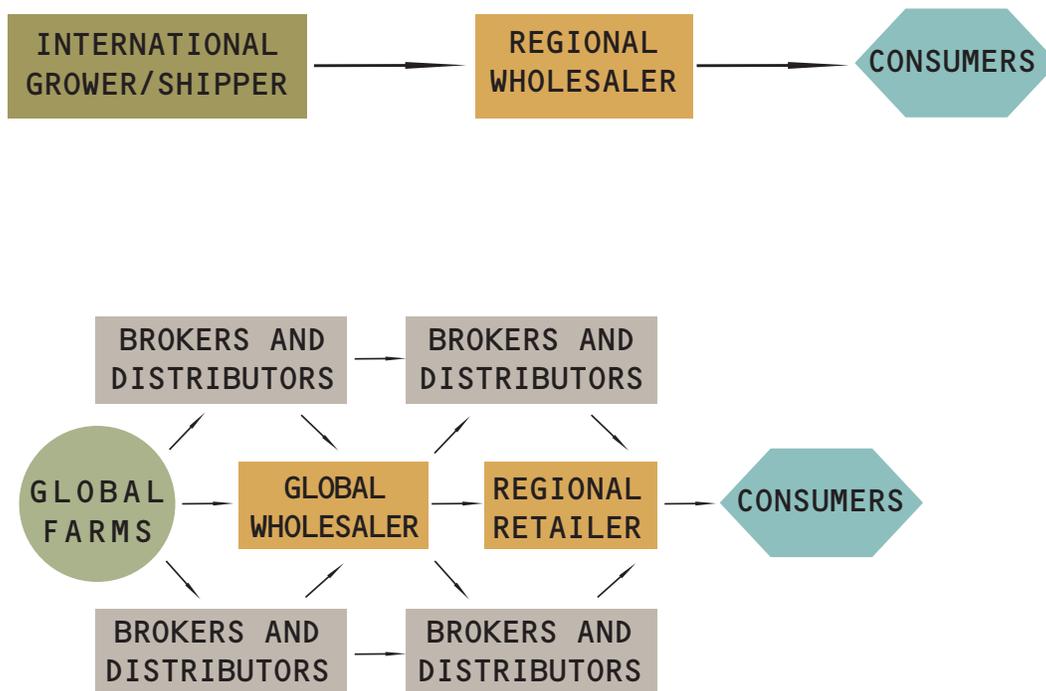
Figure 6.1 and Figure 6.2 depict flow in direct and intermediated markets at a regional scale.

Figure 6.1 and Figure 6.2



Finally, HVADC illustrates direct and intermediated markets within the global food system.

Figure 7.



APPENDIX B

Food and Farm Entrepreneur Interview Questions

1. What has worked/is working well in terms of doing business in the local foods arena/in the region?
2. What have been/are the hurdles you've had to overcome?
3. Can you anticipate hurdles coming down the road in the next 5 years?
4. Who/what has been (or would be) helpful?
5. Who/what hasn't?
6. What do you need to: be more profitable? grow your business? be a stronger business?
7. Would you like to or do you have plans to expand your operation?
8. If yes, how? What is holding you back?
9. What would help the southern region be a stronger force in the local foods arena?
10. Can you provide a summary of:
 - Products
 - Number of employees
 - Sales numbers
 - Main revenue sources
11. Can you comment on?
 - Inputs
 - financial
 - human
 - raw materials
 - Logistics (storage, transportation)
 - Markets
 - Services
 - Seasonal patterns

Bibliography

- American Planning Association. "Food Systems." *American Planning Association*, Planning and Community Health Research Center 2011, accessed from <http://www.planning.org/nationalcenters/health/food.htm>.
- Barham, J. *Regional Food Hubs: Understanding the scope and scale of food hub operations. Preliminary findings from a national survey of regional food hubs*. USDA Agricultural Marketing Service "Know Your Farmer, Know Your Food" Program, April 2011.
- Bon Appétit Management Company. *1000-plus Farm to Fork folks*. Bon Appétit Management Company, January 2011. Accessed January 2011 from <http://www.bamco.com/sustainable-food-service/farm-to-fork-folks>.
- Brown, C. and S. Miller. "The Impacts of Local Markets: A Review of Research on Farmers Markets and Community Supported Agriculture (CSA)." *American Journal of Agricultural Economics* (2008) 90(5): 1298-1302.
- Center for Sustainable Building Research, College of Design, University of Minnesota. *Sustainability 2010*. Minnesota State Colleges and Universities, June 2010.
- Christian, A. ed. *Planners Coming to the Table*. Journal of Agriculture, Food Systems and Community Development, Fall 2011 volume 2 issue 1.
- Hudson Valley Agribusiness Development Corporation. *Understanding Food Systems: Identifying business opportunities for Hudson Valley Farmers and Food Entrepreneurs*. Hudson Valley Agribusiness Development Corporation, 2011.
- Hultberg, A. *Breaking the Bottleneck: Models for Local Distribution in Minnesota*. Master's Thesis, University of Minnesota. 2010.
- Institute for Agriculture and Trade Policy. *Farm to School in Minnesota: Third Annual Survey of School Food Service Leaders*. Institute for Agriculture and Trade Policy in partnership with the Minnesota School Nutrition Association, March 2011.
- Kansas State University. *Rural Grocery Store Sustainability Initiative*. Accessed January 2012 from <http://rhttp://www.ruralgrocery.org/about/>.
- Lempert, P. "2012 Food Trends to Watch," *Supermarket News*, December 5, 2011. Accessed December 2011 from <http://supermarketnews.com/center-store/2012-food-trends-watch>.
- Low, S. and S. Vogel. *Direct and Intermediated Marketing of Local Foods in the United States*. Economic Research Report No. (ERR-128) USDA-ERS, November 2011.
- Martinez, S. et al. *Local Food Systems: Concepts, Impacts and Issues*. USDA Economic Research Report #97, May 2010.

- Meter, K. and Jon Rosales. *Finding Food in Farm Country: the Economics of Food & Farming in Southeast Minnesota*. Community Design Center Hiawatha's Pantry Project, 2001.
- Meter, K. *Mapping the Minnesota Food Industry*. Crossroads Resource Center, 2009.
- Meter, K. *Southeast Minnesota Food and Farm Economy*. Crossroads Resource Center, 2008.
- Minnesota Department of Agriculture. Ag Marketing and Development Division. *County Economic Profiles*. State of Minnesota, 2011. Accessed in January 2012, from <http://www.mda.state.mn.us/food/business/agmktg-research/economicreports.aspx>.
- Minnesota Department of Agriculture. Ag Marketing and Development Division. *Minnesota Crops Profile*, State of Minnesota, 2011. Accessed January 2012 from <http://www.mda.state.mn.us/food/business/~media/Files/food/business/economics/mncropsprofile.ashx>.
- National Farm to School Network. *Farm to School Statistics*. National Farm to School Network, 2011. Accessed in January 2012, from <http://www.farmentoschool.org/>.
- National Good Food Network. *Towards Local and Regional Sourcing - Sysco and Chipotle*. National Good Food Network [webinar], September 16, 2010. Accessed December 2011 from <http://ngfn.org/resources/ngfn-cluster-calls/towards-local-and-regional-sourcing-sysco-and-chipotle>.
- O'Hara, J. *Market Forces: Creating Jobs through Public Investment in Local and Regional Food Systems*. Union of Concerned Scientists, August 2011.
- Otto, D. *Consumers, Vendors, and the Economic Importance of Iowa Farmers Markets: An Economic Impact Survey Analysis*. Strategic Economics Group and Iowa Department of Agriculture and Land Stewardship, January 2010.
- Regional Sustainable Development Partnerships. *Local and Regional Foods in Minnesota*. University of Minnesota, St. Paul, 2011.
- Ruhf, K. and K. Clancy. *It Takes a Region . . . Exploring a Regional Food Systems Approach: A Working Paper*. Northeast Sustainable Agriculture Working Group, 2010.
- Russell, C. et. al. *Minnesota Food Production Sector: Growing Green Jobs*. Agricultural Utilization Research Institute, 2010.
- Smetanka, M. "Markets see more food stamps," *Star Tribune*, December 24, 2011. Accessed December 2011 from <http://www.startribune.com/local/west/135630693.html>.
- Southeast Regional Sustainable Development Partnership. *Southeast MN Foodshed Planning Initiative (SEPMI)*. University of Minnesota. Accessed February 2012 from <http://www.regionalpartnerships.umn.edu/index.pl?id=5835&isa=Category&op=show>

- The Food Project. "What Is "Real Food"?" *Real Food Challenge*. Accessed January 2012 from <http://realfoodchallenge.org/about/realfood>.
- Tuck, B. et. al. *The Economic Impact of Farm-to-School Lunch Programs: A Central Minnesota Example*. University of Minnesota Extension Center for Community Vitality, 2010.
- United States Department of Agriculture. Agricultural Marketing Service. *Farmers Markets and Local Food Marketing*, chart: Farmers Market Growth: 1994-2011. USDA-AMS Marketing Services Division, 2011.
- United States Department of Agriculture. *Community Supported Agriculture*. USDA National Agricultural Library. Accessed December 2011 from <http://www.nal.usda.gov/afsic/pubs/csa/csa.shtml>.
- van Schaik, C. *Getting a Handle on the Barriers to Financing Sustainable Agriculture*. Land Stewardship Project, 2003.
- Zapata, S. et. al. "Do Internet-based Promotion Efforts Work? Evaluating MarketMaker." *Journal of Agribusiness*. 2011. 29:1, 159-180.