

Sunrise Food Infrastructure Initiative: Local Markets
Viability Project
Final Report

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Executive Summary

The Washington County food system is at a critical juncture. A group of stakeholders were engaged to guide strategic planning on local food market initiatives and related issues. The report contains:

- A detailed list of sources of local food and a food system map
- A Strengths-Weaknesses-Opportunities-Threats (SWOT) analysis.
- A review of the unique status of three local food buying clubs and their development with SCEC and this study.
- Market data analysis, and a case study/ best practice review
- Strategic recommendations that, if implemented, could assist the local food system in expanding as well as becoming more sustainable, resilient, and prosperous.
- A list of specific small projects which support the strategic recommendations.

Background Statement

The Washington County food system is at a critical juncture. Demand for fresh, healthy, locally grown food is at an all-time high. There are three year-round market places (buying clubs) in the county which are dedicated to supplying local food at prices that are fair and favorable to consumers and producers alike. Increasing numbers of farms and value-added producers are supplying these markets. New farmers, many of them young, are emerging each year. Despite this, local food in Washington County remains a niche market.

The three buying clubs are relatively small operations, with very low overhead. One relies on volunteer labor to operate. Furthermore, much of the countywide local food distribution network is ad hoc, insufficient and, at times, unreliable. Producers who rely on these distribution channels struggle to operate their businesses within the system. They persist out of sheer passion, and a deeply held belief in the importance of local food. Several of the local food movement's critical components are held up by one family's persistent dedication, or rely on the generosity of single individuals to function.

The *Sunrise Food Infrastructure Initiative: Local Markets Viability Project* creates a clear picture of the weakest links in the supply chain equation and identifies precise actions that can be taken to address them, as well as resources that can be utilized for support.

General Recommendations:

1. **Encourage development of local and regional distributors.**
2. **Enhance connections** between, producers, distributors, aggregators, wholesalers, and institutions within the county and beyond into the Great Region.¹
3. **Provide learning opportunities** in the form of peer forums, customer outreach, certification trainings, formal management instruction, and a resource clearing house publication to producers, customers, and market managers.
4. **Expand microloan/grant program** for producers to purchase liability insurance, achieve GAP training, as well as assist distributors in the purchase of cool and cold storage units.
5. **Engage with local seafood** wholesalers and include them in emerging local delivery systems.
6. **Support the development/expansion of nodes for aggregation**, distribution and short term cool and cold storage on or near US Route 1 and Maine State Rt. 9.
7. **Facilitate a sharing economy at USDA certified kitchens** in granges, community centers, and at religious organizations.
8. **Support the development of a state or USDA inspected processor** of locally produced red meat² in Washington County in conjunction either with an existing custom meat processor, regional food hub or as a mobile slaughtering unit.
9. **Assist in the expansion of the on-line ordering arrangements from strictly retail into a wholesale system with expanded delivery** routes and just compensation rates for producers.

¹ A USDA designated Great Region is a multi-county region with a regional economic development plan developed by a local/regional team with broad participation. The plan is built upon careful analysis of the region's assets, including its key current and emerging economic clusters. A region that is well positioned to embark on plan development is a region where key local institutions bring the open attitude and commitment that indicates the region is ready to develop or has developed a solid plan. The multi-county region can be within the state or may cross state boundaries. In Maine, Aroostook, Piscataquis, and Washington have been so designated.

² The objective of Maine's Meat and Poultry Inspection program is to assist very small to medium sized meat and poultry processors by providing state inspected slaughtering facilities. Three tiers of inspection exist within the structure. Custom exempt processing requires the lowest level of oversight as the meat is slaughtered for home use only, and may not be resold. Subsistence farmers and hunters often use custom exempt butchers to process large animals for their own consumption. State inspected facilities are overseen by a state inspector, and products from these facilities can be resold in the state of Maine. Slaughtering animals at a USDA inspected site allows the meat to be shipped and sold interstate. For a more complete explanation of Maine's Meat and Poultry Inspection program, visit their website at: https://www1.maine.gov/dacf/qar/inspection_programs/red_meat_poultry_inspection.shtml

- 10. Encourage** buying clubs to establish wholesale relationships with their suppliers.
- 11. Facilitate planning** between buying clubs, farmer's market managers, farmers and value added suppliers.
- 12. Facilitate the cooperative use of business services** such as a bookkeeper between the buying clubs.
- 13. Foster the development of a professionally run regional food hub** with aggregation, long term cool and cold storage, and distribution access in a central location.
- 14. Support the development/expansion of nodes for aggregation**, distribution and short term cool and cold storage on or near US Route 1 and Maine State Rt.
- 15. Engage with tertiary educational institutions**

Local Food Market Viability Study Group

A group of stakeholders were engaged to guide strategic planning on local food market initiatives and related issues. They include Inez Lombardo (Machias Market Place), Richard East (Growing Concern Farm & Nursery), Judy East (Washington County Council of Governments), Regina Grabrovac (Washington County One Community), Charles Rudelitch (Sunrise County Economic Council (SCEC)), Molly Owens (SCEC), Tanya Rucosky (SCEC), Elizabeth Sprague (Maine Farmland Trust (MFT)), and Anne Hopkins (Eat Local Eastport).

Inez Lombardo runs the Machias Market Place, a buying club that has steadily grown into a retail local food store. Inez moved to Washington County from New York City in 1986. She returned to college in 2001 and graduated from the University of Maine. Inez has linked her business to a growing number of local farms and the Crown of Maine Organic Cooperative (COMOC).

Richard and Judy East own and operate Growing Concern Farm and Nursery. Richard is a trained horticulturist, and has operated large and small farming operations for over 40 years. He has operated Growing Concern as a small business since 1978 focusing on landscaping, horticulture, vegetable production, land management, construction, and customized excavation and stonework. He and Judy sell retail and wholesale nursery products, landscaping services and run a retail farm stand and buying club for fresh local produce.

Wearing two hats, Judy is also the Executive Director of the Washington County Council of Governments (WCCOG). Judy has a Master's of Science in Planning with an undergraduate degree in Biology and Economics. She heads WCCOG, a municipal membership organization that delivers a wide range of customized planning, advisory and resources development services for Washington County municipalities. Her recent work in the local food system includes inventory and GIS mapping of local food producers and retail markets, as well as wholesale and processing capacity. She was a primary organizer of the 2014 Washington County Food Summit with Regina Grabrovac and Elizabeth Sprague.

Regina Grabrovac represents Washington County One Community (WC:OC). WC:OC is a coalition of county organizations focused on countywide strategic planning, capacity building and community investment strategies. There, Regina is the Washington County Farm to School (FTS) Coordinator overseeing the county farm to school programs and supervising the Food Corps programming in Washington County. Regina is a powerful community organizer, having contributed to multiple local food systems sustainability initiatives across the state and implements the FTS program in Washington County. Regina works directly with schools to provide curricular and culinary support. Her resources include Maine Harvest Lunch, The Apple Project, and the University of Maine Cooperative Extension School Garden program curriculum. She encourages farm-to-school cook connections through a School Supported Agriculture program, provides professional development and Back to Basics cooking workshops to food service staff

and cooking/taste testing events for students. Regina has a strong background in small scale farming and still grows, harvests and gathers food for her family in East Machias.

Charles Rudelitch is the Executive Director of the Sunrise County Economic Council (SCEC). The Sunrise County Economic Council (SCEC) initiates and facilitates the creation of jobs and prosperity in Washington County, Maine. SCEC works with a consortium of community-minded businesses, not-for-profit organizations, municipalities and citizens. Charles is a Harrington native from a dairying family. He has served as a staff attorney for Pine Tree Legal Assistance in Hancock and Washington. In addition to the legal field, he has worked in economic and community development for the towns of Brighton, Fort Kent and Guilford, and the Passamaquoddy Tribe.

Molly Owens worked for SCEC at the initiation of the study as the Program Manager for Local Foods. As a farmworker and lawyer, Molly's ability to organize and her close ties to several Washington County farm leaders expedited the study and opened numerous doors.

Tanya Rucosky, also with SCEC, picked up the local food program management tasks during the last third of the project. With a formal and practical background in both research and natural resource management, she completed the study and did much of the strategic analysis and report writing.

Elizabeth Sprague is the Farm Business Planning Manager from the Maine Farmland Trust (MFT). MFT is a statewide organization that works to secure a future for farming in Maine by protecting farmland and supporting farmers. In 2014 MFT opened Unity Food Hub, an aggregation and distribution facility in Unity, Maine.

Elizabeth originated, designed, and managed the projects, conducted the research, and authored both the *Farm to Market Access Report* (2007) and the *Down East Farm-to-Cafeteria: New Markets, New Opportunities* report (2009). Most recently, Elizabeth organized and implemented four day-long trainings attended by 67 farmers from around Maine: *Harvesting Maine's New Wholesale Opportunities* which will have as it's bookend a two-day intensive workshop for 30 farmers on the business of wholesale. Elizabeth works directly with farmers to improve their ability to make the best decisions about their farm business operations. As a certified entrepreneurship instructor, she taught entrepreneurship for seven years in Washington County to farmers, small business owners, and Native American businesses. She originated and implemented food system projects in WashCo ranging from farm-to-market and farm-to-institution work, farm-to-school, on-farm storage, farmers' market governance / marketing / signage, formation of buying clubs and was a contributor to the development of ordering software, and food security projects including Wholesome Wave's veggie vouchers.

Anne Hopkins runs Eat Local Eastport Cooperative, one of the local food buying clubs in Washington County. Eat Local Eastport Cooperative is a consumer and producer owned marketplace providing the greater Eastport community with the best quality food at its true cost. It supports regional food production and cares for the community's health. An

artist by training, Anne's passion for wholesome food and organization led her to taking on a leading role in local food system distribution in the region.

The group met seven times during the course of the study, and provided advice via electronic media, one-on-one meetings and phone calls. They provided invaluable insight as well as further contacts to businesses, individuals, institutions, non-profits, and researchers currently involved with local food market viability, distribution, aggregation, and storage issues.

Existing Local Food Markets, Distribution Networks, Aggregation/ Storage nodes, and Producers.

Washington County is home to a vibrant and growing local foods movement. Any useful plan for the future grounds itself in the present. To that end, a detailed list of food producers, distributors, retailers and processors was built from databases assembled by the Washington County Council of Governments and the University of Maine at Machias GIS Service Center and Laboratory. This database is presented on an update to the poster of the local food system in *Washington County: Local Food in Washington County – Where Does Your Food Come From – Where Can You Get it?* **See Appendix I**

Underserved Local Food Markets--Development Capacity

Appendix II provides a USDA Map of the food desert in Washington County. This mapping resource was used to identify underserved areas. Food insecure areas are generally located away from the coast where both the fishing and tourism industry support denser populations, and higher incomes.

The links between poverty and poor health outcomes are numerous, complex, and intertwined. While there is well-developed literature on urban food access and poverty, rural poverty issues have received notably less attention in both the academic research and policy arenas. This is significant since poverty rates are highest in both the most urban and most rural areas of the United States. Additionally, high and persistent poverty disproportionately occurs in rural areas.³ Most concerning in rural environments is a tendency towards low vehicle access rates and a complete lack of public transportation.⁴ Since most U.S. citizens are highly dependent on a vehicle for grocery shopping, access to transportation is a particularly critical factor for low-income households in rural food deserts.

The food deserts identified in Washington County are the collective result of several forces. These include the growth of a superstore (with a large variety of food products), an insufficient population base to support a wide array of small markets. Further, food distribution channels favor larger food retailers at the expense of smaller food stores in rural areas. Filling the void to some degree are convenience stores/gas stations, and general stores. These stores tend to charge a premium for a limited range of foods stocked with convenience and shelf life in mind and often with low nutritional values.⁵

With these factors at play, local contacts were established in the target area. Excellent communication pathways were built and continue to evolve with growers and retailers in Wesley, Grand Lake Stream, Perry, and Waite (villages situated deep in the identified zones.)

Further, promising contacts were developed with the farmer's market and grocery store in Princeton. While Princeton is not in the designated region, it directly adjoins the food desert in Indian Township. This area is particularly vulnerable as it is home to a large portion of Washington County's indigenous population who continue to labor under a historical legacy of poverty and disenfranchisement. Promisingly, all growers and distributors contacted in the food desert expressed a strong desire to increase production and distribution of local foods.

³ Weber, "Rural Poverty: Why Should States Care and What Can State Policy Do?" *The Journal of Regional Analysis & Policy*. 2007.

⁴ Dutko, Ver Ploeg, and Farrigan, "Characteristics and Influential Factors of Food Deserts". USDA, 2012)

⁵ "Rural Realities" Rural Sociological Society, 104 Gentry Hall, University of Missouri, Columbia, MO 65211-7040

The strong local demand and identification of keen distributors has connected buying clubs and farms on the coast with these interior markets. These relationships continue to evolve and grow to the benefit of both groups. Further, these in-land producers and distributors are now better engaged with SCEC. Through connections made during this study, they can more easily access resources such as CEI business planning as well as grant and loan programs available through SCEC.

Market Analysis for Local Food Aggregation and Distribution Network

Local food producers, distributors, aggregators, wholesalers were interviewed to understand and articulate key factors that contribute to the viability of local food markets in Washington County, Maine. Sunrise County Economic Council (SCEC) and their network of community partners have identified strengths, capacities, risks and opportunities around the development and expansion of local food markets and distribution systems. This builds on the *Farm to Market Access Report* (2007) and the [*Down East Farm-to-Cafeteria: New Markets, New Opportunities*](#) (2009) both of which were originated, managed and written by Elizabeth Sprague.

Methods:

This study was undertaken primarily through one-on-one interviews, but was enriched with informal ad hoc dialogue.

Primary Analysis of Consumers of the Existing Local Foods Producers, Markets, Distribution, Aggregation, and Storage System:

Producers:

Eleven producers were engaged during this study. (Among these were: Beaugard Farms, Tide Mill Creamery, Garden Side Farms, Rising Phoenix Farm, 10th Village Farm, Tide Mill Organics and Salty Dog Farm)

Communication:

Several producers expressed a desire to be better coordinated with each other, so that a greater diversity of products could be offered.

Products:

Producers identified eggs as a product of which there was a nearly infinite local appetite. Greens such as beet tops and kale were also universally noted as being favorites in the local community.

A lack of inspected red meat processing in Washington County has been identified as a limiting factor in producers' willingness to expand herd sizes and new farmers' willingness to begin farming.

Farm Management:

Producers were working within three different farm management practices. They felt these management styles needed to be clarified to the community. They identified the management styles as: conventional, certified organic and organic principled. There was a general frustration with the organic certification process. Producers suggested the current system drives small farms to sizes (and levels of indebtedness) they do not wish in order to off-set the cost of the certification process.

Further, some producers saw the certification process as wasteful (food waste cannot be recycled into feed, nor can certified organic animals easily free range), Byzantine in terms of paperwork, and overly prescriptive for small producers. They saw certified organic as yet another way large agri-business sought to lock small producers out of mainstream markets.

“It is hard to free range your animals and be certified organic-- that seems counter to the point of organics in terms of animal quality of life, and short supply lines.” said one producer.

Finally, because of the costs, certified organic products were not reasonable options for many local buyers. “I can’t afford to eat the food I produce,” commented one certified organic farmer. Other producers cited their commitment to providing affordable food to the local community as a reason for **not** pursuing organic certification, despite following organic food principles. **For the local community, organic principled foods were the best fit in terms of price point and quality.** Certified organic products should be marketed to distributors on the coast which have the highest demand from affluent summer visitors.

Community Engagement:

There was a fair diversity in the levels with which producers wanted to engage with their customers. Some producers were very responsive to their customers, seeking their guidance on crops, and growing to order. These were likely to attend farmers’ markets with the purpose of promoting dialogue and educating their customers. In fact, a number of producers saw education as an important role which they undertook to assure their long term success.

Wholesalers:

One wholesaler was interviewed. Her company’s needs and focus were very specific. She was not interested in marketing to local consumers. However, as a seeker of aggregation space, there was some overlap of need with local retailers.

Retailers:

Farmer’s Markets

The managers of two farmers’ markets were interviewed for this project, and anecdotal information was gathered from two others. Of highest concern was cost management for vendors. It was noted that insurance for farmers’ markets makes it difficult for small, occasional producers to participate.

Both market managers and users commented on the current low quantity and variety of foods offered. A narrow selection of items was by far the most

commented upon weakness in the current system. While some producers were working together planning strategic planting regimes across multiple properties, this was the exception to the rule. Some producers were actively taking requests from buyers, but again, most were not. Around issues of greater product diversity, the presence of seafood vendors and ready to eat/convenience food sellers had been found to boost attendance and sales.

Buyer shyness was also identified often in those customers who were most sensitive to price. Farm market managers had noticed these customers were hesitant to ask about prices, preferring instead to interact with vendors who clearly labeled their products. Similarly, uniform access to EBT stations allowed access to the broadest portion of the community.

Grocery Stores

Eleven Washington County Grocery and General Store managers/owners were contacted and ten were interviewed during the course of this study. Their level of interest was high with several trends noted. The stores were asked for general thoughts and ideas as well as for specific data.

Price

The interviewer noted concerns over price grew as one moved geographically northwest. This was not a coincidence considering the north western region was suffering under the most adverse economic strains which were not ameliorated by an influx of summer people from the mid-coast and south. Not unexpectedly, these price concerns mapped tightly to the USDA Food desert map. Further exacerbating the focus on price was the presence of a large multi-national super store in the northern region. This store's buying power was capable of offsetting shipping costs and under cutting local producers. In this region, local foods must be in-line with prices offered by traditional wholesalers. This tendency was ameliorated only in small markets with a significant "Lake Community" summer populations (Grand Lake Stream and Wesley (Rt. 9 through traffic)).

Local Self-Sufficiency

North of Waite/Topsfield, store owners reported no interest from the community in purchasing local vegetables in grocery stores. The community in Danforth was much more food self-sufficient than in the rest of Washington County. The population is not alienated from their agricultural roots, and produced most of their own fresh vegetables in their own backyard garden plots. Thus the local grocery store reported a low volume of fruit or vegetable sales, not only for local produce, but in general.

Jellies, candies, baked goods, meat, and specialty canned goods however did find buyers even in the most self-sufficient marketplace.

Community Nodes

Unable to compete purely on price, local grocery/general stores marketed themselves as community nodes and bulwarks against the homogenizing influence of mega-business. They sought to distinguish themselves from their large multinational competition by offering higher quality, local products and capitalized on their community connections. They felt customers were strongly drawn to local foods, and that selling local foods promoted the store's connection to the community. They also felt local foods were better quality in terms of nutrition and freshness than similar mass produced high-food mile offerings.

Liability Insurance

Liability insurance requirements are related to the scale of wholesale sales with the farmer – and to federal food safety requirements. Thus, many larger grocery stores required producers to carry liability insurance. Smaller “mom and pop” operations expressed a much higher level of flexibility. Seafood was the one food item which was highly regulated regardless of store size or ownership model.

Long Shelf Life Value-Added Foods

All stores interviewed supported, purchased and carried local products with long shelf lives. Value-added products such as mustard, and maple syrup were ubiquitous and carried through established suppliers. This willingness to carry these low-risk, generally high value items indicates significant room for growth in the sector. The items carried at various locations included specialty vinegars, pickled and fermented products, granola, jams and jellies as well as handmade soaps and cosmetics.

Milk, Eggs and Local Specialties

Most stores carried or expressed an interest in carrying local milk products and eggs. They also offered seasonal regional specialties such as fiddleheads, and berries. These products evoked the highest levels of enthusiasm from store managers. Despite being highly perishable, store managers reported fast turn over for these products.

Meat

There was general interest in local meat, as well as value-added meat products. However the capacity to produce inspected and therefore ‘retail ready’ local red meat products does not currently exist. Local poultry and rabbit operations were coming on line during the study period, and will be met with a strong appetite.

Seasonal Vegetables

All stores stocked seasonal local vegetables at some point with varying reports of success. Store managers noted that vegetables were carried

only irregularly because of inconsistent supplies as well as inconsistent levels of quality, and professionalism from producers.

Generally, any and all good quality vegetables were welcomed. However, many storeowners moderated their willingness to sell local vegetables with the assertion that producers could not expect to receive a retail level of payment from them.

Ordering and Delivery

Stores in the Eastern Coastal regional (Calais south down the Rt. 1 Corridor) reported they would be pleased to carry any local produce available. They noted the primary barrier was the lack of a simple, easy, consistent, and professional delivery system.

Store owners in general pointed out local producers often expect to be paid retail prices for their products, not factoring in the stores' costs to run their facilities, market the products, or pay their staff. Usually managers had very few contacts with producers. Those contacts they had were as much personal as professional. Because of the small community sizes, the store managers were sensitive about being perceived as "playing favorites." They expressed relief at the idea of making the buying process more professional and at arm's length.

Store managers regularly noted Tide Mill Farms and Growing Concern having professional staff, and making regular deliveries. One of these two organizations may be the best poised to expand and manage any delivery system developed in the region. Stores reported, and the interviewer observed, Tide Mill Farm seemed to currently be at or slightly beyond its delivery capacity.

Seafood

Stores in Calais north to Princeton articulated a strong desire for local seafood (Lobsters, clams, scallops, and fish). They repeatedly expressed embarrassment and exasperation that they were selling Asian and Icelandic fish within 50 miles of the Gulf of Maine. However, seafood is covered under its own very strict liability insurance and tracking requirements. This regulatory situation made individual producer to retailer interactions nearly impossible. Further, as a fairly expensive product, prices needed to be closely in-line with large wholesalers to be viable.

Education

Grocery stores held a diverse set of opinions about their role in marketing local products. Some undertook an educational role and aggressively promoted foods that might be unfamiliar to their consumers. This included stocking foods for several weeks with few sales while customers

“got used to them being available.” Alternately, one manager expressed absolutely no interest in marketing local specialty farm products.

Retail Customers

Distinctions were often drawn between local consumers and ‘summer people.’ “Summer people’ brought with them higher expectations for food quality and diversity. “Summer people’s” price points were considered to be much more flexible. Stores with a high number of ‘summer people’ (coastal and lake communities) were less concerned about price.

Based on the region’s isolation and level of economic distress, year round residents did not historically carry the same expectations of fresh, high quality food and diverse choices. The however, this is changing rapidly. Year-round customers were well educated about the health and social benefits of eating locally produced food. The growth of buying clubs and farmers markets has been strongly supported by the local year-round community. Despite their limited ability to pay high prices, they have a growing desire for fresh, local and healthy produce. Some year-round residents report driving up to an hour each way to locally owned grocery stores where they perceived they could source higher quality and lower cost produce.

Finally, there was also an awareness of Washington County’s growing Latino population, and fresh food offerings were increasingly tailored to their perceived tastes.

Autonomy

Each grocery store exhibited a great degree of discretion with regard to shelf-space and product selection based on the personal values of owners and managers. Managers’ levels of engagement ran the gamut. One was uninterested and unwilling to even talk about local food, much less stock it, while another was so passionate that he personally sourced local foods from the farm gate for his store. This could be a significant risk, as a change in management could abruptly change the stores’ engagement with local producers. Multiple strong and positive relationships must be fostered to maintain long-term engagement with each store.

Buying Clubs/Co-ops

The three area buying clubs/co-ops provided a high level of detail concerning their strengths, weaknesses and capacities for this study. All are in a period of rapid growth in excess of 15% annually. While this rate of development clearly cannot be sustained indefinitely, it speaks to future market potential. This is especially true as all are currently located in areas that have the highest summer visitor densities.

However, the markets are ultimately affected by the low year-round population density and high levels of poverty among those year-round residents. For local buyers, buying club stock was often prohibitively expensive. Several issues created this situation including pressure from farmers who desire to sell to the clubs at or near retail price and the clubs' tendency to carry only organic stock. Further, as new businesses run by professionally developing managers some of the clubs did not have a good handle on their operating costs.

Two of the three buying clubs are operated with a strong reliance on volunteers. They are significantly subsidized in terms of rent and labor. This has a substantial impact in terms of the hours the organizations could maintain, as well the skill sets of staff. At two of the buying clubs, staff were compensated below market rates, if at all. They repeatedly claimed to work "for the love of it." While the staff and community passion for these organizations is laudable, there is a looming risk of burn-out. Further, because the staff are under-paid, only passionate but generally inexperienced managers have stepped into the jobs. While the staff are highly motivated and willing to learn, this inexperience is also a risk. Finally, despite high levels of growth, the two community hubs are not yet profitable.

While both of these buying clubs were located in shop fronts in the downtown main streets of the communities they served, because of their lack of profitability, and limited staff, they were only open for a few hours per week. This severely restricted the number of customers they could serve, and customer convenience was low under the current system. Both clubs were planning to significantly expand their hours over the coming year as their focus was increasingly on moving from a buying club model into a retail one.

The third buying club, Growing Concern, operated out of an existing retail farm-stand and nursery. While not on a main thoroughfare in its community, it is expanding as well. Growing Concern runs under a very strong business model, and thus could not be compared to the others reasonably. This buying club's largest interest beyond profitability was distribution. With professional management, it has taken the lead among the buying clubs buying from growers wholesale and delivering to larger markets. They are potentially poised to take on a greater role in solving the distribution opportunities identified.

Institutions

Each institution is unique, and it was unfortunate this study didn't have a greater opportunity to interact with them. A much more thorough exploration of portions of this market can be found in *Down East Farm-to-Cafeteria: New Markets, New Opportunities* report (2009).⁶ Good Shepard Food Bank and Downeast Farm

⁶ [Down East Farm-to-Cafeteria: New Markets, New Opportunities report](#) (2009) by Elizabeth Sprague.

to School (DF2S) were informally interviewed. Anecdotal information was gathered regarding UMM, and Calais Hospital. Local restaurants, summer camps, nursing homes, senior meals programs, and sportsman's camps remain largely unexplored⁷.

While small over-laps occurred, there were not enough institutions engaged to truly provide a strong view of the market sector. More work should be undertaken to fully understand the potential of the institutional markets.

The institutions engaged all were government run or non-profits with diverse funding sources. This diversity of funding is a potential strength, as it could inject resilience into any proposed model in the face of funding vagaries. As well as diverse funding streams, institutions brought with them a fair level of infrastructure including staff, refrigerated trucks, and cool/cold storage. As government and non-profits entities, they were already focused on community improvement and have institutional cultures which favor creative and collaborative initiatives that offer multiple bottom lines.

DF2S was well engaged with schools through-out the region and growing. They reported consistent struggles with distribution, especially as they sought foods from larger growers in Aroostook County.

Most institutions were not engaged with Washington County food producers currently (DF2S being the exception). However, they had repeatedly expressed an interest to do so. They lacked formal and informal connections to the farming community. SCEC with DF2S are strongly placed to address this gap.

The institutions interviewed expressed the greatest desire for nutrient rich, highly durable crops such as onions, carrots and potatoes. Fruits with long self-lives such as melons; apples and pears would also be readily accepted.

Institutional motives for local food consumption included a desire to support the local economy and to engage in the community, as well as provide their clientele with fresh high quality food.

⁷ As this project wrapped up, Farm to Institution New England (FINE) launched the Maine Food for the UMaine System coalition made up of organizations and individuals working to build a stronger and more sustainable, fair and resilient food system in Maine. Their [Recommendations for the Food Service Contracting Process Contract & RFP Language that Would Lead to an Increase in Local & 'Real' Food in the University of Maine System Dining Operations Submitted to University of Maine System Food Service RFP Committee & Office of Strategic Procurement June 2015](http://www.farmtoinstitution.org/sites/default/files/imce/uploads/MaineFoodfortheUMaineSystem_RFPReco.pdf) can be found here: http://www.farmtoinstitution.org/sites/default/files/imce/uploads/MaineFoodfortheUMaineSystem_RFPReco.pdf

The prevailing sense among producers and institutions was a requirement that GAP certification was imminent. There was an erroneous perception this could quickly close off the institutional market to almost all producers without GAP certification.

Identified strengths and capacities:

- Cold and cool storage space exists at various distributors and institutions for use or rent.
- Stakeholders with refrigerated transportation could support an expanded distribution system.
- Strong general understanding of the benefits of local food and interest therein exists in all sectors.
- Waite General Store expressed interest in becoming a food aggregation site
- A Harrington Buying Club is emerging.

Identified Weaknesses:

- Population is low, financially vulnerable and therefore very sensitive to price.
- Walmart is strongly under cutting the price of local foods because of their capacity to buy at scale.
- Shelf -space and product selection is based on the highly personal values of the owners and managers, and may change abruptly with the departure of a single individual from the organization.
- Producers' interactions with distributors are often disorganized and unprofessional.
- Some producers have unrealistic expectations of receiving a retail price from wholesalers and retailers, and do not value marketing and distribution costs.
- The cost of small scale and organic farm produce is beyond the buying capacity of most local consumers.
- Most buying club staff are unpaid or under-paid enthusiastic amateurs who could easily be poached by better paying work or simply burn-out.
- In several instances, buying club staff have no business training.
- Potential competition between retailers.
- Lack of coordination among producers limits variety.

Identified Opportunities:

- Production in almost all markets has not reached capacity.
- Retailers are willing to carry items that hold extended shelf lives.
- The growing Latino population could support further diversity of products
- Goat meat is poised for greater market share with the changing ethnic demographics.
- There is a strong appetite for local seafood (scallops, lobster, clams and fish) in Calais and north.
- Consumers, buying clubs, and distributors have an opportunity to work together to inform and coordinate with producers.

- There is a very strong appetite among mid and low income consumers for local conventional and organic principled farm products.
- Buying clubs are in the position to evaluate their true costs of operation and look at ways of improving their operations substantially.
- Unique and creative shared space opportunities could emerge as wholesalers aggregate local products for shipment south.
- Emerging and developing institutional markets are not yet fully exploited by the local food network.

Secondary Analysis of Consumers of the Existing Local Foods Producers, Markets, Distribution, Aggregation, Storage Systems:

In examining case studies of similar local food distribution the USDA report *Moving Food Along the Value Chain* was used heavily. The report examines the aggregation, distribution, and marketing of eight diverse food value chains to glean practical lessons about how they operate, the challenges they face, and how they take advantage of emerging opportunities for marketing differentiated food products. It's focus is on the operational details of food value chains—business networks that rely on coordination between food producers, distributors, and sellers to achieve common financial and social goals— and how to move differentiated products from regional food suppliers and buyers to customers.

Four themes that cut across the eight case studies and provide valuable insights:

The level of investment in infrastructure should match the organization's stage of development and marketing capacities

How much and when an organization invests in infrastructure is vital to the success and ultimate survival of the enterprise. Whether it makes sense for food value chain distributors to invest heavily in infrastructure depends on operational scale, proximity to customers, and availability of existing distribution assets, financial capacity, and their ability to capture value throughout the supply chain.

Four nonprofit distribution models (among the 8 case studies) tend to overinvest in infrastructure because of its ability to solicit grants and donations and a tendency to focus on needs in the community rather than asset mobilization.

Four cooperative distribution models (among the 8 case studies) were much more conservative and invested in infrastructure in tandem with business growth and needs.

Value chain managers must ensure identity preservation from farm to market as a way to establish marketing claims and improve negotiating position with buyers

The identity preservation employed by the various distribution models to differentiate their products was largely dependent on its relationship with farmers, retailers, and individual consumers. When there is a great deal of preexisting trust between

consumers and the seller, there is less need to specify which farmer produced an item or to create a third-party certification scheme. When there is less trust or social connection between consumers and sellers, identifying the farmer on each produce package helps establish marketing claims and better positions products in a competitive selling environment.

Distribution entities using informal producer networks can adapt to the constantly shifting demands of diversified, niche food markets

While agricultural cooperatives have played a major role in product aggregation and food marketing, new models of producer coordination are emerging that offer more flexibility to suppliers and buyers. With more informal supply networks, farmers benefit from a more diverse market channel mix by balancing risk and not “putting all their eggs in one basket,” and the distribution entities were under no obligation to take all of its members’ production. Informal farmer networks seem to be appropriate for marketing diverse products like fruits and vegetables; more formal cooperative structures may be more appropriate when dealing with single, uniform products. A diverse range of products, each with its own separate costs of production, processing requirements, and prices, makes it difficult to allocate costs and benefits to cooperative members.

Nonprofits and cooperatives can play key roles in value chain development but should recognize its organizational competencies and play to its strengths

As nonprofits and cooperatives engage in value chain activities, they should consider what roles are suited to its capacities and recognize how its limitations can be mitigated through building strategic partnerships with other value chain actors. Cooperatives may benefit from partnering with nonprofits for training, education, and resource prospecting; nonprofits may find it worthwhile to partner with cooperatives or other business entities to provide infrastructure support or supply chain management services.

Market Analysis Recommendations:

Connections and Education:

1. Facilitate stronger connections among regional food producers, wholesalers, institutions, retailers and related government and non-profit organizations.
2. Support peer-training forums to address issues such as pricing, marketing and farm management.
3. Engage farmers in training regarding the growing and selling for wholesale markets. (MFT has developed such training and offers it to farmers statewide.)
4. Through the Northern Maine Development Commission, facilitate and engage with growers in the Houlton area to develop distribution networks up the Rt. 1 corridor.
5. Encourage producers, markets and buying clubs to work together to educate customers about the “real cost” of local food
6. Provide opportunities for formal management training of buying club managers as well as producers.
7. Encourage greater participation of seafood vendors and ready to eat/convenience food producers at farmers’ markets.
8. Create a clearing house of free or low-cost opportunities available for producers such as loans, grants, soil testing, technical support, and other services.
9. GAP (Good Agricultural Practices) training.
10. Participation by buying club managers in programs such as the Down East Business Alliance’s Incubator Without Walls (IWW) and Advanced Incubator Without Walls programs

Certifications:

1. Establish microloan/grant program for producers to purchase liability insurance.
2. Establish microloan/grant program to assist producers in USDA kitchen certification process.

Aggregation and Distribution:

1. Engage with local seafood wholesalers and include them in the developing local delivery system.
2. Foster the development of one food hub with aggregation, cool and cold storage, distribution and value adding activities. This could contain a USDA certified kitchen that could be rented (or bought into on a membership basis) by small producers for value adding activities.
3. Foster the expansion/development of aggregation and distribution nodes in Eastport, Harrington, Milbridge, Wesley, Grand Lake Stream, Waite, Calais, Woodland and Princeton.
4. Assist in the expansion of a wholesale on-line ordering system with an associated delivery routes.
5. Cooperation between the buying clubs to purchase produce in bulk from local farmers at a wholesale prices.

Infrastructure:

1. Continue efforts to support the creation of local state or USDA inspected red meat abattoir.

2. Expand microloan/grant system to assist distributors with the purchase of display cool and cold storage units.
3. Expand microloan/grant system to assist producers with adding infrastructure to meet GAP requirements.

Economic Opportunities, Challenges and Strategic Planning for Existing Local Food Marketplaces

During the course of the study, each of the three buying clubs initially involved has grown at a rate of 15-20% percent annually. Each buying club has responded through its work with SCEC and through the connections generated by this study in unique ways.

Confidential business planning, cash flow projections and management assistance have been made available to each buying club through SCEC's partnership CEI. CEI provides financing and technical assistance to small and medium-sized businesses in Maine, New England, and rural regions throughout the U.S.

Growing Concern:

A for-profit business, Growing Concern is least like the other buying clubs included in the study. Growing Concern's buying club is part of a larger farm, nursery and landscaping business which supports its development. It prides itself on providing retail and wholesale nursery products, landscaping services, and as well as being a retail outlet for fresh local produce.

Operating year round, they produce vegetables and fruits in field and greenhouse settings. They also offer produce and value-added food products from as many as 80 other Maine producers including Tide Mill Organic Farm in Edmunds, South Street Greenhouse in Eastport, Bridges Wild Blueberries in Calais, and Crown of Maine Organic Cooperative.

As a for-profit farm in its own right with 6 acres of crops and orchards, and a distributor, Growing Concern operates under a far more complicated and potentially rigorous set of standards than the other buying clubs included in this study. The business is owned and operated by Richard and Judy East. A highly-trained horticulturist, Richard's formal and practical understanding of farm management is decades deep. Judy's training and experience in regional economic development lends the business a realistic, conservative, yet hopeful approach to planning and development.

Growing Concern Farm & Nursery is a small urban farm located in the city of Calais. Though urban, as a farm, it is not located on the main or even well-travelled city streets. They experience significant "shopper shyness" despite inviting and informative signage on South St., which is one of the main streets in town. "I don't know when they are open," and "I didn't want to disturb anyone..." were sentiments voiced during the research portion of the project.

The East's 'years in the trenches' and long term year-round presence is slowly eroding hesitancy on the part of consumers to come to the end of Manning St. to visit their farm and store. They report a significant and growing clientele from not only Calais, but also a high proportion of trade coming from Eastport, and St. Stephen across the Canadian border.

Not sitting at the end of Manning St. on their laurels, the Easts have taken it upon themselves to deliver produce out into the community, and provide local foods to a number of grocery stores. Building on their successes, Growing Concern would like to expand its business further into the distribution realm. It has put itself forward as a potential distributor of organic and local foods to the entire county, and beyond. It is currently taking the lead as not only a local food aggregation and marketing center in Calais, but is building a local distribution network. This network currently includes several grocery stores and farmers markets.

In interviews with the retailers they serve, high praise was universally voiced for the quality of Growing Concern's products as well as the East's professionalism and reliability. In fact, they are often held up by grocery store managers as the model to which they desired other producers aspire.

While Growing Concern hopes to expand further, the Easts are uncertain whether an expanded distribution network is viable considering the low wholesale value of some farm produce and large geographic area covered by Washington County. They hope to find a way to subsidize the expansion of Growing Concern's distribution network to reach a larger market.

Eat Local Eastport Co-op:

Located on an island at the end of a peninsula seven miles from US Route 1, Eat Local Eastport Cooperative (ELEC) is a consumer and producer owned marketplace. It seeks to provide the greater Eastport community with the best quality food at its true cost. It perceives itself as serving a dual role of supporting regional food production and caring for the community's health. Evolving from a CSA in Manager Annie Hopkins' kitchen 7 years ago, the co-op is experiencing annual growth of 15- 20% and that trend seems likely to continue for the next year.

Situated now in a bright airy store front on Eastport's main street, Water St., the co-op is well supported by a community that includes both year round residents and 'summer people.' The co-op is led by Anne and a dedicated Board of Directors committed to the success and expansion of the business. As an organization formed by the community for the community benefit, ELEC retains a strong and highly creative desire to collaborate with Eastport's many community organizations and businesses.

ELEC, and the Machias Market Place which will be discussed in detail below both began with a buying club structure. However, as both moved from private homes into retail space, 'al la carte' sales have become a larger portion of each business. While on-line ordering forms the keystone of their business plans, both function as 'pop up' green grocers selling fruit, vegetables, meat, and eggs on consignment from local producers.

Solidifying their increasingly retail model, both ELEC and the Machias Market Place seek to bring non-perishable locally produced items such as syrups, preserves, canned fermented products, dry goods and cosmetics into their spaces to 'round out' the stock

against the vagaries of the seasonal produce supplies. ELEC has been particularly proactive in this regard, and is positioning itself to become a profitable health food store with a significant range of local and organic foods available year round.

ELEC's concerns focus on several different aspects of their continued financial viability. They are painfully aware, (and this was brought up repeatedly through the study by both producers and retailers) that organic food is extremely expensive in a market that is highly cost conscious. Though the business is growing, high costs impact sales volumes, and the store has yet to fund the market manager at a competitive rate. ELEC finds itself in a difficult position—it is a business that is rapidly out-growing its retail space, but has yet to make a profit.

Only Anne's generosity and personal passion for the business are seeing it through the rapid growth of its infancy, to an anticipated level of sales which will make the co-op sustainable. Dependence on the passion and generosity of staff and volunteers is a recurring theme through-out interviews with the buying clubs. While this passion and perseverance is laudable, it places the buying clubs at a significant risk, as passions can be exhausted, and a lack of adequate remuneration leaves the buying clubs vulnerable to employee poaching.

Most of the buying clubs operate with a spiritual midwife such as Anne. However, these community leaders have their limits in terms not only of time and energy, but also training. As passionate novices, Anne and Inez at the Machias Market Place have repeatedly expressed an urgent desire for further business training, both for themselves, and for the producers with whom they interact. A natural organizer, and artist, Anne brings her unique down-to-earth, no-nonsense creativity to ELEC. However, she has no formal training in financial management, advertising, or business planning.

Because ELEC is a consumer and producer coop, Anne acts as the arbiter between struggling producers trying to get the most for their crops and struggling consumers on limited budgets. Committed to maintaining an equitable system, Anne noted both groups have unrealistic expectations. For instance, consumer prices are high due, at least in part, to farmer's selling to the buying clubs at close to full retail. While she struggles to manage these demands, Anne stated producers would benefit from training regarding the costs of marketing and distribution. Anne's comment, "Producers need to understand they can't get retail prices from a retailer," was echoed throughout the study, from retailers all along the size continuum.

Anne expressed a secondary, unique concern regarding competition from the local IGA. An interview with Forest Robbins, the R&M IGA manager, confirmed a strong personal and business commitment to local foods. From the point of view of producers and county-wide efforts to promote local foods, this commitment is wholly positive. However, ELEC perceived it as somewhat threatening, since the larger store is open far more hours per week, and can buy at wholesale rates. It is interesting to note that nowhere else in the study was competition mentioned as a concern *between* locally owned retailers, either on the part of the small buying clubs, or by larger sellers.

Conversely, Bayside Shop-n-Save in Milbridge even welcomed the local farmer's market into their parking lot on a weekly basis. Therefore, this threat may be an isolated one of perception and proximity.

Although ELEC did not identify it, Eastport's geography limits its capacity for expansion as a regional food node. Relatively far from the major north south artery of Rt. 1, ELEC is not a logical point for producers to aggregate, store or distribute their offerings.

Despite concerns, ELEC noted a number of hopeful factors which have influenced their search for additional retail space and commitment to expanding their hours of operation. While it has been noted that Washington County as a whole experiences significant economic challenges, the Eastport area has been nationally recognized as a growing bright spot. Buoyed by highly proactive community efforts to reinvent themselves, as well as breathtaking scenery, a diversified fishery, and a deep water port, Eastport is one of the most vibrant communities in Washington County. Increasingly, it is drawing vacationers north from the mid-coast with the promise of unique and economical maritime experiences.

With this in mind, the staff and board of ELEC have assessed their strengths and weaknesses and are moving ahead to tackle issues of space and staff training. They are keenly aware of the dangers associated with rapid growth, and are taking a thoughtful and conservative long term approach to serving the local foods market of Eastport.

Machias Market Place:

Machias Market Place (MMP) is located on Main St. in Machias, on the lower level of the Machias Hardware Store. It is held together by a small group of passionate individuals. Like the other buying clubs, its rate of growth is in the high teens with projected growth for 2015 indicating this will continue.

The Machias Market Place (MMP) came into the local foods industry early, and has been building on the upswing of interest in short food miles since 2006. At its inception, like Eat Local Eastport, Machias Market Place was run from a home. Sarah Gabrielson began the buying club. Her kitchen served as a pick-up point for Tide Mill Organic Farm's CSA customers. With 10 families, each week Tide Mill would send out their availability list and then participants would email Sarah with what they wanted. Soon Gardenside Dairy and Hatch Knoll Farm added their inventories to the weekly order list.

A Sunrise County Economic Council Gracie Fund Grant recipient in 2007, Inez Lombardo undertook running the buying club to complete the volunteer portion of her grant obligation. In March of 2010 the buying club moved to its present location, and became the Machias Market Place--open 3 hours a week with 20 families. Thanks to a grant from Western Maine Alliance and the Dept. of Agriculture, the Machias Market Place bought a double door display cooler, a display freezer, and a scale. In 2015, it received a Slow Money Grant which paid for an electrical upgrade in their leased space and additional cooler and freezer space.

While initially a pure buying club, Machias Market Place has added *a la carte* food items, which can be purchased without ordering in advance. This, says Inez, has brought in an entirely new group of customers, and is MMP's largest sector of growth.

In 2012 the Machias Market Place began ordering from Crown of Maine Organic Cooperative (COMOC), (a Maine-wide organic food distribution company) and increased their hours of operation. Utilizing the Harvest to Market order website, the number of families pre-ordering has jumped to nearly 60. This increased the number of customers and amount of sales. Importantly, it allowed the Machias Market Place to become more efficient.

Building on word of mouth and the '*al la carte*' offerings, Inez has increasingly built an active web presence which features public discussions about food quality, social issues around food as well as real time updates on what is in stock. She feels the computer is a powerful tool for customers to keep abreast of the ever-changing inventory of goods from the comfort of their keyboards, as well as a chance to reach new customers.

From its inception the Machias Market Place has been an outlet for local growers, and has acted as an incubator for new growers. Like Anne, at ELEC, Inez feels she is a mediator between farmers and customers, offering both a valuable service. "The club makes it more convenient for customers to buy from farmers," Inez said. "It's also better for farmers; sometimes they don't have time to sit at a farmers market."

With the market far from saturated, Inez has taken a leadership role improving the local food selections for customers. Unfortunately, Inez has seen farm businesses come and go. The rise and fall of farms as well as the vagaries of the weather makes it hard for MMP to plan for the quantities and varieties of produce which will be brought to market. She notes irregular farmer supply represents a barrier to the MMP's smooth growth. Thus, she actively encourages farmers to expand the varieties they produce and spread their risk from any one crop failure. Despite these concerns, Inez remains hopeful. A year round market, she energetically supports farmers in extending their seasons with greenhouses. "I could sell every green farmers bring in!"

Inez's genial, engaging personality, her training in Community Studies from University of Maine at Machias and her practical experience as both an organic food buyer and farmer has given her a practical but hopeful stance. New farms are continually being added as her suppliers, and this, as with the other buying clubs, is supplemented by a steady core of products from COMOC.

Inez's interest in social justice has made her a leader in expanding the Machias Market Place's payment options. She was quick to gear up to accept SNAP benefits and participates in FarmShare, a state-sponsored program that provides seniors with free produce. Through it, eligible seniors receive free vegetables and fruits. Inez says the line stretches out the door on FarmShare days. In order to accept EBT payments the Market had to be a registered business, so in 2014 it became an L3C (a low-profit LLC with a

social mission.) Professional fees associated in this process were funded by a grant from Healthy Acadia.

Despite the strong growth, the Machias Market Place, struggles with very low margins. These low margins make the need for a professional bookkeeper both highly necessary, and potentially cost prohibitive. As at ELEC, MMP needs different shop space, but low margins make moving aspirational at this point. It is deeply frustrating for MMP and ELEC to be working in a sector with an enviable growth rate, which has yet to become financially viable.

A high value, low volume product, which can be stored long term, meat, is central to the market viability of all three existing buying clubs (Growing Concern, the Machias Market Place, and Eat Local Eastport Cooperative). Increasing the variety and availability of meat is essential, yet there is no local processor of red meat for retail resale, and animals are shipped as far as Pennsylvania to be slaughtered at a USDA inspected site. These costs make retail local meat prohibitively expensive for almost all year round Washington County residents.

The pressure to become more financially sound is on MMP in particular. The sole management of MMP places it at a significant risk, as its success is purely based on Inez's continued vibrant health and passion for local food. She acknowledges one of the greatest barriers to MMP becoming larger is succession planning and a broader management structure. Further, like Anne at Eat Local Eastport, Inez has no formal business training. Both she and Anne would benefit greatly from participating in a program such as the Down East Business Alliance's Incubator Without Walls (IWW) and Advanced Incubator Without Walls programs. These no-cost business training courses could help them work strategically to develop their business. The lack of formal business skills makes it hard for either buying club to plan with as much confidence as they would like.

Despite these concerns, MMP is well located in a major population center on Route 1. Further, Machias Market Place aspires to become a regional food hub.

Harrington Co-op:

While the study was underway, a fourth co-op/buying club began to form in the southwestern edge of Washington County on Route 1. The group has secured space, and is now up and running with volunteers. They participated in strategic planning with the other buying clubs from the outset, and benefited from the experience, and strong professional network fostered by this study.

Sheila Chretien and Chris Alexander, have taken the lead in setting up this newest buying club. Sheila worked for Department of Health and Human Services and is passionate about food access for low income people and nutrition education. After her retirement she began to farm full time and farm and became a farmers' market participant. However, starting a buying club had always been one of her goals.

Chris was the first farmer to bring goats to Washington County and is the informal regional goat expert. She and her husband, John, own Sugar Hill Cranberry Company, and sell cranberries throughout Maine and New England.

In partnership, the pair launched the Harrington Buying Club in early 2015.

Case Studies and Best Practices

Case studies and best practices materials were shared and commented upon by the LMVP Study Group. Case studies were selected with a focus on rural areas with long distribution routes and low population densities. Case studies from outside the US were not used, as different legal and social systems preclude strong alignment with local conditions. Case studies with a focus on the use of food hubs to improve local food security, and address issues of food justice were given particularly close scrutiny, despite the fact that they tend to focus on urban areas. **Appendix IV** includes a bibliography of publications reviewed, an outline defining the potential role of food hubs, and a series of recommendations based therefrom.

General Recommendations

- 1. Encourage development of local and regional distributors.** Sliding scale rates should be explored for local deliveries.
- 2. Enhance connections** between, producers, distributors, aggregators, wholesalers, and institutions within the county and beyond into the Great Region.⁸
- 3. Provide learning opportunities** in the form of peer forums, customer outreach, certification trainings, formal management instruction, and a resource clearing house publication to producers, customers, and market managers.
- 4. Expand microloan/grant program** for producers to purchase liability insurance, achieve GAP training, as well as assist distributors in the purchase of cool and cold storage units.
- 5. Engage with local seafood** wholesalers and include them in emerging local delivery systems.
- 6. Support the development/expansion of nodes for aggregation,** distribution and short term cool and cold storage on or near US Route 1 and Maine State Rt. 9.
- 7. Facilitate a sharing economy at USDA certified kitchens** in granges, community centers, and at religious organizations.
- 8. Support the development of a state or USDA inspected processor** of locally produced red meat⁹ in Washington County in conjunction either with an existing custom meat processor, regional food hub or as a mobile slaughtering unit.

⁸ A USDA designated Great Region is a multi-county region with a regional economic development plan developed by a local/regional team with broad participation. The plan is built upon careful analysis of the region's assets, including its key current and emerging economic clusters. A region that is well positioned to embark on plan development is a region where key local institutions bring the open attitude and commitment that indicates the region is ready to develop or has developed a solid plan. The multi-county region can be within the state or may cross state boundaries. In Maine, Aroostook, Piscataquis, and Washington have been so designated.

⁹ The objective of Maine's Meat and Poultry Inspection program is to assist very small to medium sized meat and poultry processors by providing state inspected slaughtering facilities. Three tiers of inspection exist within the structure. Custom exempt processing requires the lowest level of oversight as the meat is slaughtered for home use only, and may not be resold. Subsistence farmers and hunters often use custom exempt butchers to process large animals for their own consumption. State inspected facilities are overseen by a state inspector, and products from these facilities can be resold in the state of Maine. Slaughtering animals at a USDA inspected site allows the meat to be shipped and sold interstate. For a more complete explanation of Maine's

9. **Assist in the expansion of the on-line ordering arrangements from strictly retail into a wholesale system with expanded delivery routes** and just compensation rates for producers.
10. **Encourage** buying clubs to establish wholesale relationships with their suppliers.
11. **Facilitate planning** between buying clubs, farmer’s market managers, farmers and value added suppliers.
12. **Facilitate the cooperative use of business services** such as a bookkeeper between the buying clubs.
13. **Foster the development of a professionally run regional food hub** with aggregation, long term cool and cold storage, and distribution access in a central location.
 - a. This hub *must* develop a broad model of management including the undertaking of solid business and fiscal training, planning and development.
 - b. “‘Mission-driven’ hubs founded only on the ideal of helping organize local farmers, or to increase food access... do not often have a well thought-out business plan or a high degree of fiscal responsibility... A food hub should have at least one member of its staff dedicated to both the business and financial planning of the enterprise. It is not enough to be an organization with connections between farmers and consumers; without a viable business plan, a hub will quickly fall apart due to lack of governance and foresight. A new food hub should make hiring a well-qualified full time coordinator a top priority. The contributions they provide will have a high return on investment”¹⁰
14. **Support the development/expansion of nodes for aggregation**, distribution and short term cool and cold storage on or near US Route 1 and Maine State Rt.
 - a. Sites in Calais, Machias, Harrington/Milbridge, Princeton/Waite and Wesley are viable with space and advocates already in place
15. **Engage with tertiary educational institutions**
 - a. Food service should be encouraged to become a major institutional consumer of local foods.

Meat and Poultry Inspection program, visit their website at:https://www1.maine.gov/dacf/qar/inspection_programs/red_meat_poultry_inspection.shtml

¹⁰ *An Analysis of New England Food Hubs with a focus on Applications in Low Food Access Areas* by Tara Shewchuk, Brandon Okray, Robert Mahoney and William Frankian.

- b. UMM's Environmental Liberal Arts program should interact closely with the food hub offering internship and research opportunities.

Specific Potential Projects

Electrical Upgrades - Harrington Market	\$3000
Produce Cooler – Harrington Market	\$2600
Frozen Storage Unit – Harrington Market	\$2300
Refrigerated Van Lease for 24 Months – Growing Concern	\$18000
Wholesale Shipping Containers – Growing Concern	\$600
Buying Club management training.	\$4,500
Producer training regarding wholesale selling and implementing growing at scale	\$4,500
On-farm storage for inputs and feed	\$36,000
Marketing and wholesale market development	\$31500
Distribution and delivery (250 miles/trip for 100 weeks at \$0.575/mil)	\$14375
Technical Assistance from Maine Farmland Trust	\$4,500
Point of sale register and scales –ELEC	\$1,999
Screen Door - ELEC	\$300
Air Conditioner - ELEC	\$600
Counter - ELEC	\$600
Display shelving - ELEC	\$1,500
Double Door Refrigerator & single door Freezer - ELEC	\$5,933
Apple Laptop - ELEC	\$1,600
Computer, printer, labelling software - Growing Concern	\$1,749
Produce Cooler - Growing Concern	\$999
Electrical Up-grade - Growing Concern	\$1,750
Large cooler (storage) - Growing Concern	\$2,500
Large Freezer - Growing Concern	\$1,000
Mobile computer and mobile printer - Growing Concern	\$900
Small Freezer for delivery truck- Growing Concern	\$300
Electronic Produce scale - Machias Market Place	\$150
Expanded Retail Space 1 year rent - Machias Market Place (\$6 per sq. foot for 10,000 sq. feet)	\$60,000
Awnings - Machias Market Place	\$265
Shelving 16 feet - Machias Market Place	\$1,000
Upright Display Freezer – Machias Market Place	\$2,700
Square card reader - Machias Market Place	\$30

Appendix I—Food System Master List and Map

The database of local food information in Washington County is comprised of 9 spreadsheets that distinguish among the following categories within the local food system:

- Farms (73 entries)
- Farmers’ Markets (8 entries)
- Online markets and buying clubs (4 entries)
- Specialty Foods (14 entries)
- Retailers with Local Food (30 entries)
- Processors and Commercial (5 entries)
- Seafood (8 entries)

As businesses and farm operations enter the market, merge with adjacent operations and exit the market, the database will change over time. There is an on-line opportunity to add a new operation to the map located at www.gro-wa.org/wcfood.

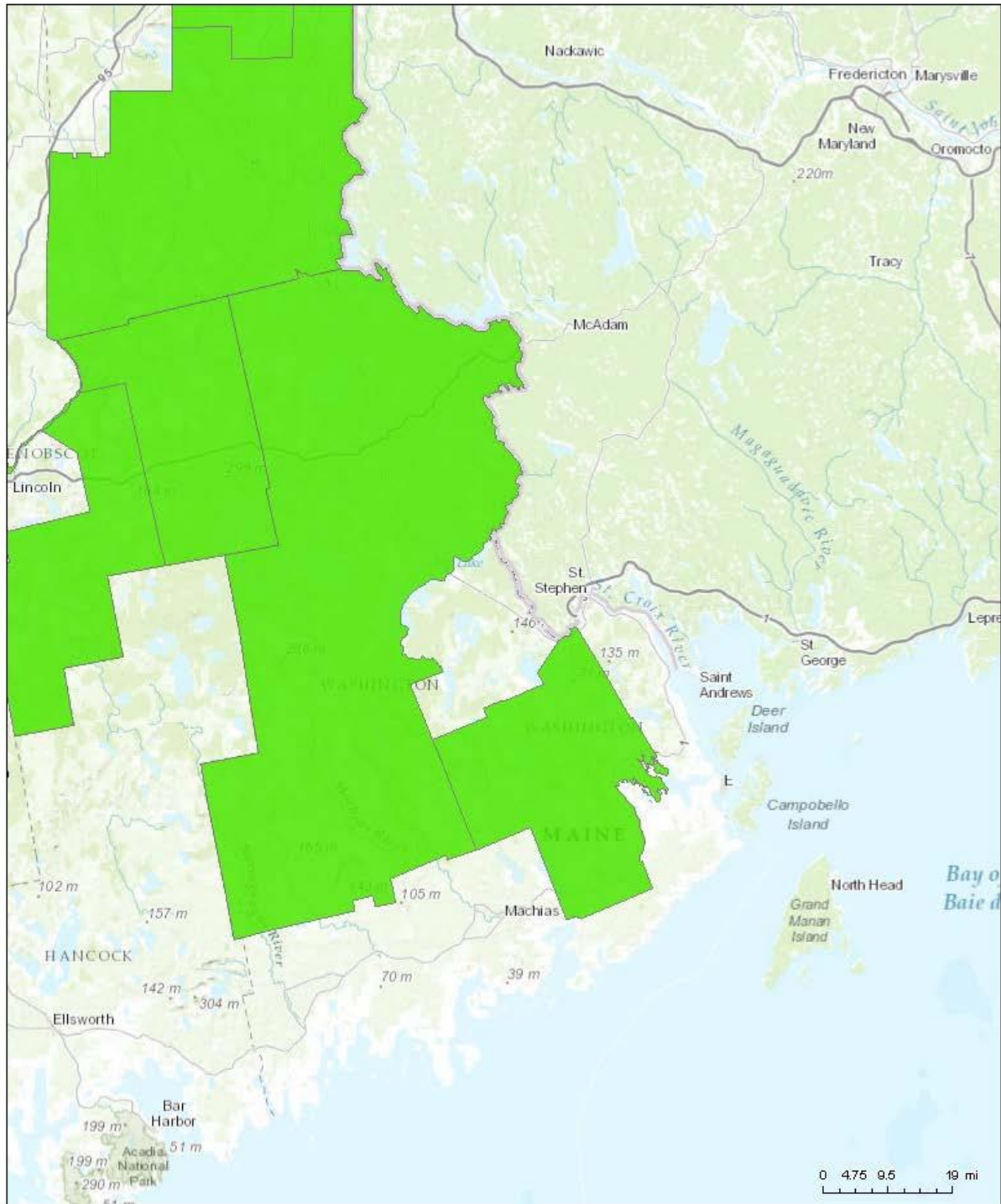
Future work, and funding, is needed to incorporate this database into the Maine Food Atlas (www.mainefoodatlas.com).


A celebratory poster of the Washington County database, most recent version date of July 21, 2015, is reproduced at right.

Additional funding is needed to print the 34 by 36 inch poster on high quality, non-fading paper stock.



Appendix II -- USDA Map of the Food Desert in Washington County



 LILA at 1 and 10
Date: 6/5/2015

Washington County Maine Food Desert

Source: USDA Economic Research Service, ESRI. For more information:
<http://www.ers.usda.gov/data-products/food-access-research-atlas/documentation.aspx>

Appendix III—SWOT Analysis of Existing Local Food Producers and Markets

12-8-2014

Participants: Charles Rudelitch, SECEC; Molly Owens, SCEC; Judy East Washington County Council of Governments; Regina Grabrovac, Washington County: One; Ted Cater, farmer; Inez Lombardo, Machias Market Place, Marc Trip, Grey Lady Baking Co.; Ellen Johnson, Landcove Farm; Karen Herrick, Rob Hill Farm; Anne Hopkins, Eat Local Eastport Cooperative; Maria Emerson, Wild Wescogus Berries; Meg Keay, Eastport Farmer's Market; Daphne Luring, University of Maine Machias GIS Service Center;, Tora Johnson, UMM; Barbara Anthony, Machias Valley Farmer's Market; Felicia Newman, Coast of Maine Organics; Richard Hoyt, Lubec Farmer's Market; Richard East, Growing Concern; Elizabeth Sprague, Maine Farmland Trust; Eric Morrison, Milbridge Buyer's Market

Strengths

- Markets and buying clubs are seeing an increased need and demand for local foods
- Good, healthy, local food is being provided to local customers
- A la carte menu at buying clubs increases sales
- Some farmers markets do not have a "Market Master" or by-laws – this allows for more flexibility and freedom (*other markets identified this as a weakness because of lack of organization and predictability)

Weaknesses

- County-wide need for more farmers providing local food
- Lack of farmers who understand wholesale growing at appropriate scale and getting more yield with better farm practices
- Farmers markets need for more and diversified vendors
- Lack of certified meat processing in Washington Co. – this has been identified as a limiting factor in producers' willingness to expand herd sizes and new farmers willingness to begin farming
- There is a need for better communication between producers and buying clubs to identify customer needs/wants; what the buying clubs could sell more of; what buying clubs need less of.
- Lack of understanding in the community re: What is a buying club? Is there a membership fee? How do I join? How do I order?
- Actual or perceived unaffordability of local foods for low-income people
- Some producers at markets do not advertise prices on their products and therefore people do not know what they can afford (particularly people on a limited budget) and may be unwilling to inquire
- Lack of uniformity of where customers can use their SNAP and WIC benefits
- The pre-order model of buying clubs: Does this limit who uses buying clubs? Do people plan that far in advance? Can buying clubs count on customers to pick up their orders?

Opportunities

- Better collaboration between producers and markets/buying clubs will allow producers to plan accordingly
- Greater diversity of vendors and items for sale at farmers markets (such as ready to eat/convenience foods) could attract more and new customers
- Mobile farmers market/vegetable van that travels Route 1 might be an opportunity for increased distribution
- Desire for more local meats
- Storage availability would change how much producers could provide to customers and buying clubs
- A better understanding of the demographics a producer, market, or buying club serves would help target what is in demand
- Producers, markets and buying clubs can work together to educate customers about the “real cost” of local food
- Free or low-cost resource availability for producers such as loans, grants, soil testing, technical support, and other services. These were perceived as not being widely known about or taken advantage of
- Possibility of holding GAP (Good Agricultural Practices) training. Some food sellers (ex: Hannaford) require producers to have this certification in order to sell their product. Schools are also moving toward requiring GAP certification

Threats

- Lack of centralized storage locations (dry, frozen, and cool)
- Limited distribution
- Lack of farmers
- Lack of vendors at markets
- Lack of certified meat processing facilities

Appendix IV—Case Study and Best Practice Review

Case Studies and Literature Reviewed:

The State of Local Food: In the Central Ohio River Valley. Prepared by the Green Umbrella Local Food Action Team December 2013.

Building a Community-Based Sustainable Food System Case Studies and Recommendations University of Michigan Urban & Rural Planning Capstone Project April 2009.

Assessing the Economic Impacts of Regional Food Hubs: the Case of Regional Access. Todd M. Schmit, Cornell University Becca B.R. Jablonski, Cornell University David Kay, Cornell University December 2013.

Food Hubs: Solving Local Small-Farm Aggregators Scale Up With Larger Buyers March 2014 AUTHORS Patty Cantrell, Regional Food Solutions LLC Bob Heuer, Public policy & marketing strategist Corporate CSA.

An Analysis of New England Food Hubs with a focus on Applications in Low Food Access Areas by Tara Shewchuk, Brandon Okray, Robert Mahoney and William Frankian.

Local and regional food systems in Nebraska: Best Practices and Case Studies. Jon M. Bailey Director, Rural Public Policy Program Center for Rural Affairs

Local Environment: The International Journal of Justice and Sustainability Research-Based Support and Extension Outreach for Local Food Systems

The 20% Shift: The Economic Benefits of Food Localization for Michigan and the Capital Required to Realize Them by Michael H. Shuman May 2013

This New San Francisco Corner Market Design Will Make You Crave Vegetables Can “resetting” corner stores change the way people eat? Caroline Kim Jun 1, 2015.