West Michigan Agriculture Cluster Impact Analysis

August 29, 2025

WEST MI SHORELINE
Regional Development Commission

Highland ECONOMICS

This report was prepared for

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I. Introduction

Agricultural processing is a cornerstone of West Michigan's economy, linking local agricultural producers to regional, national, and global markets. This report presents the findings of a comprehensive study examining the scope, impact, and opportunities for growth in this vital industry in West Michigan. The study focused on the counties of Lake, Mason, Muskegon, Newaygo, and Oceana (the "Five County Area").

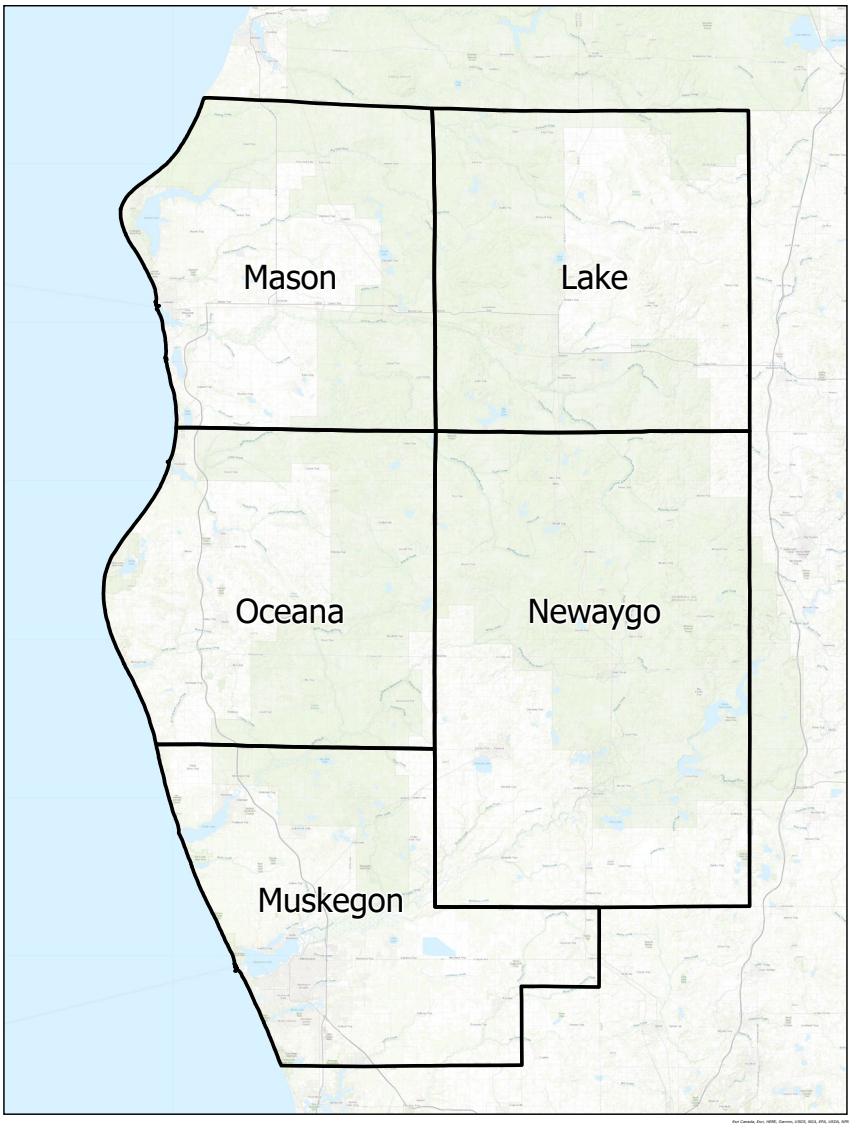
The West Michigan Agriculture Cluster Impact Analysis was commissioned by the West Michigan Shoreline Regional Development Commission (WMSRDC) and conducted in 2025 by Highland Economics with support from the Michigan State University (MSU) Geographic Information Systems (GIS) team and guidance from a project steering committee.

The study consisted of four components:

- **Economic Impact Analysis** – examines the size and character of the agricultural processing industry and how its economic impacts ripple outward through the local economy
- **Market Analysis** – explores the most important factors affecting the viability of the agricultural processing industry and potential opportunities for growing the industry
- **Economic Profiles** – summarizes the economic characteristics of agricultural processing industry in the Five County Area and each of the counties individually
- **Comparative Analysis** – compares the agricultural processing industry in the Five County Area to the industry in the neighboring counties of Kent and Ottawa, and explores potential approaches for strengthening the industry in the Five County Area

This study relied on a wide range of information sources to inform its findings. These included surveys of agricultural producers and processors; public data sources such as Bureau of Labor Statistics and the Census of Agriculture; proprietary data sets, such as IMPLAN; site visits to farms, food processing facilities, wastewater facilities, and business incubators; interviews with farmers, processors, supporting businesses and organizations, educators, economic development organizations, and public officials. The MSU GIS team also contributed spatial analysis. Conclusions and recommendations for the study are integrated into the relevant sections of the report.

II. Economic Impacts of the Ag Processing Industry in West Michigan



Economic impacts describe how industry activity ripples out through the economy. This section explores the economic impacts of the agricultural processing industry in the West Michigan counties of Lake, Mason, Muskegon, Newaygo, and Oceana (the 'Five County Area'), using IMPLAN model data for the food and beverage processing industry and timber processing industry (wood and paper products).[i]

We describe the economic impacts in terms of their direct, indirect, and induced impacts, which are the results of the model further explained below and in Section II County Level Economic Impacts.

The **ag processing industry** supports

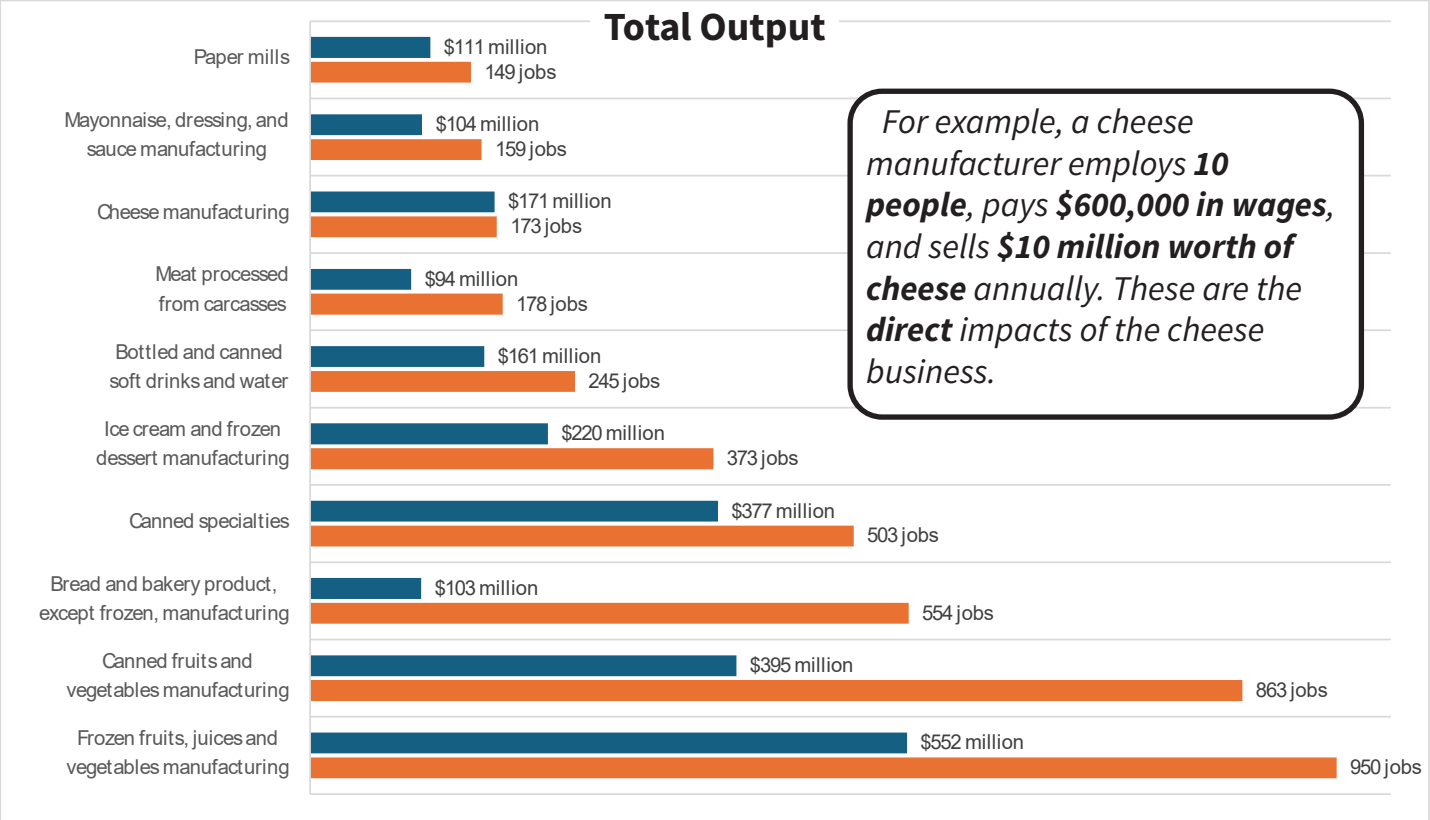
$452M	8,839	$166M
in labor income	jobs	in tax revenue

in West Michigan

i Highland Economics; IMPLAN Group LLC. (2023). IMPLAN model. This analysis does not consider the economic impacts of fresh market sales of food products or products that are "lightly" processed and sold by the growers themselves.

Direct Impacts

Direct impacts are the economic activity that is directly connected to the business or industry of interest. In total, the agricultural processing industry in the region generates $2.8 billion annually and supports over 5,400 jobs. The largest sectors are the industries that process fruits and vegetables into frozen, canned, and other packaged products. These sectors generate annual sales of roughly $1.37 billion (almost half of the total agricultural processing output in the region) and employ over 2,400 people. The next largest portion of direct output comes from dairy product manufacturing, which generates nearly $412 million in annual sales and supports roughly 640 jobs.



In **West Michigan**, there are:

68+	$2.8B	5,430
ag processing establishments	in annual sales of processed ag goods	jobs in the ag processing sector

Indirect and Induced Impacts

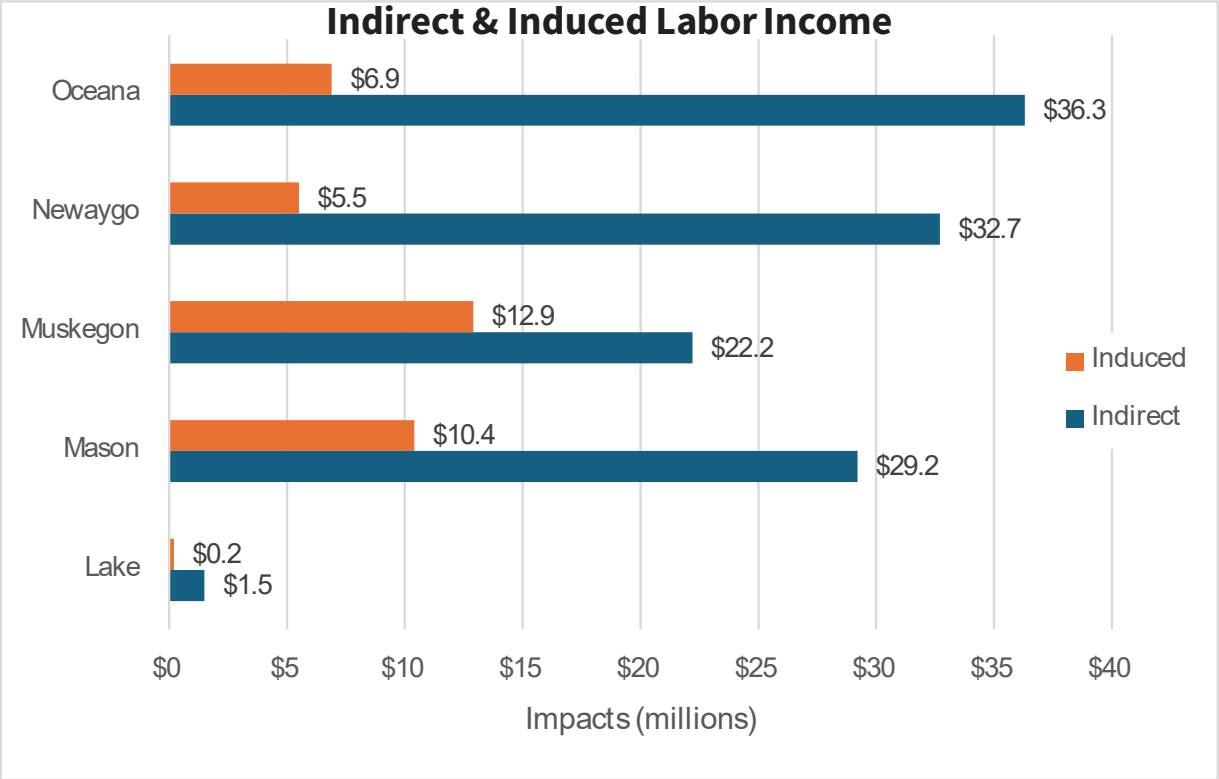
Indirect impacts are the economic activity generated by businesses buying from other businesses.

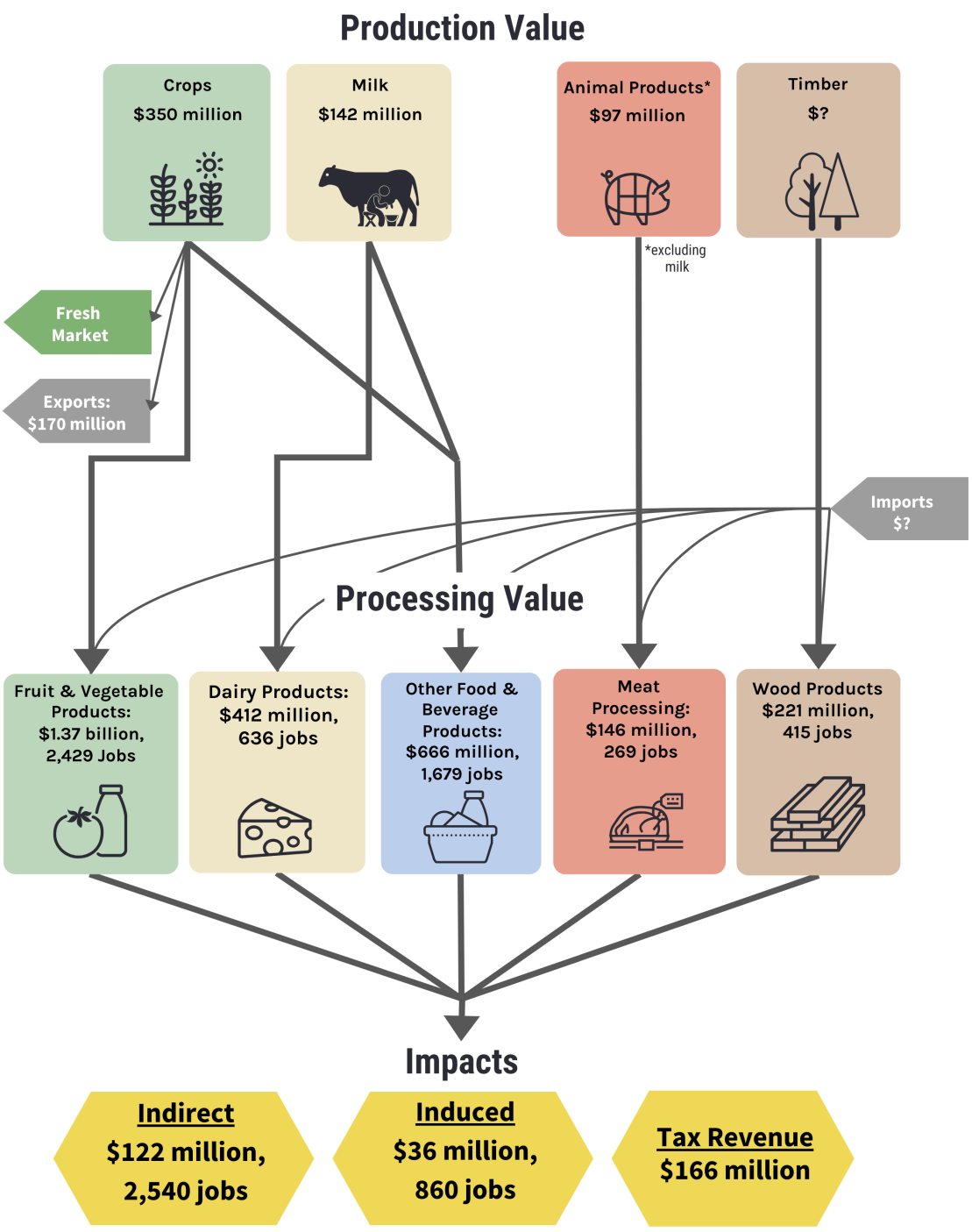
*In the example of our cheese maker, they need to buy **$5 million** worth of milk and other supplies to make the cheese. These purchases support **three jobs** and **$150,000 in labor income** in businesses that sell these products to the cheese manufacturer. These are the **indirect** impacts of the cheese manufacturer.*

Induced impacts are the economic activity that occurs when workers (both from the direct and indirect jobs) spend their wages in the economy.

*In our example, workers at the cheese factory make total **wages of $600,000** and the jobs supported by the cheese maker's purchases support another $**150,000 in labor income**. A portion of this **$750,000 is spent** in the local retail stores, grocery stores, gas stations, and other businesses, supporting **two jobs** and **$70,000 in income**. These are the **induced** impacts of the cheese manufacturer.*

The agricultural processing sector in the Five County Area supports around 2,540 jobs indirectly and another 860 induced jobs, for a total of approximately 3,400 jobs that are supported by the industry but not directly. Along with these jobs, the industry supports nearly $158 million in indirect and induced wages.





The diagram above shows the economic structure of the agricultural processing industry in the Five County Area. Agricultural production (at the top) provides inputs to the processing industry, along with imported goods. Not all agricultural production goes to local processing; some are sold as fresh market products and some are exported to other areas of the state, country, and internationally. The processing sector creates its own jobs, wages, and revenues (shown alongside each sector), but also supports indirect and induced jobs and income in the regional economy.

As shown in the figure, there are some data gaps in the economic structure of the industry. These gaps include the value of harvested timber, the value of imported goods used for processing, and the portion of agricultural production that goes into the fresh market. This data is generally available at the state and national levels, but not at the county level.

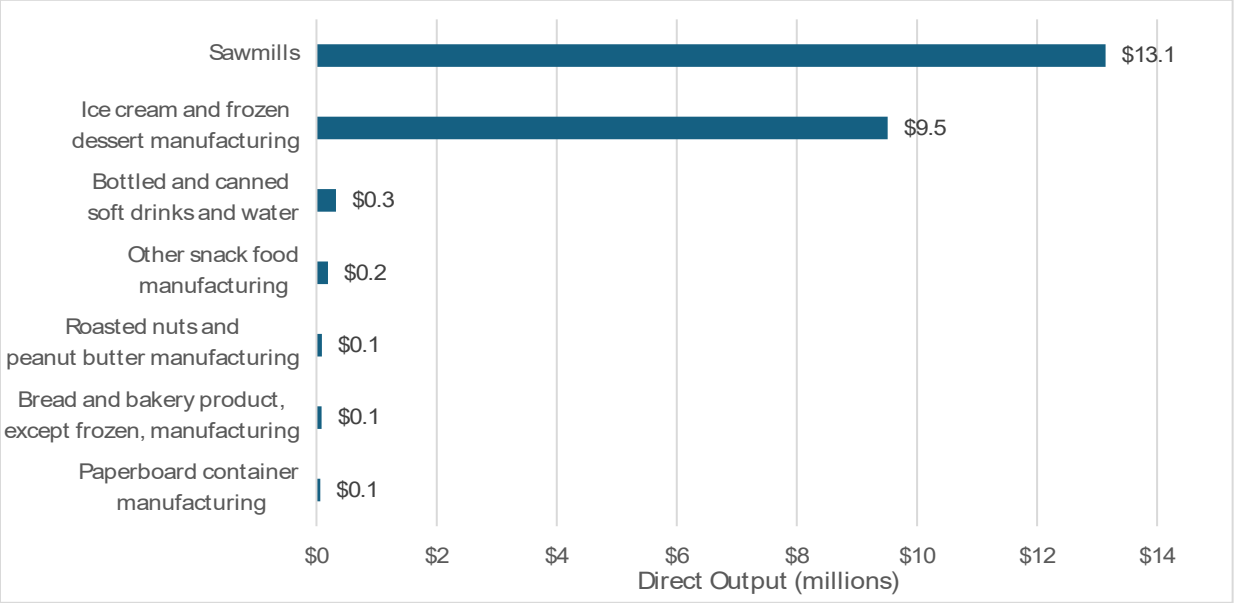
III. County Level Economic Impacts

Lake County

In **Lake County**, there are

>3	$23.4M	52
ag processing establishments	in annual sales of processed ag goods	jobs in the ag processing sector

Lake County has the smallest agricultural processing sector in the Five County Area, but the industry still generates over $23 million in annual sales and supports over 50 jobs. More than half of this activity comes from sawmills: $13 million and 28 jobs. Ice cream manufacturing is the second leading sector with about $9.5 million in annual sales and 22 jobs supported. The industry further supports another 40 jobs in indirect and induced economic activity, as well as $5 million in labor income and nearly $1.7 million in annual tax revenues.



The **ag processing industry** supports

$5.0M	90	$1.67M
in labor income	jobs	in tax revenue

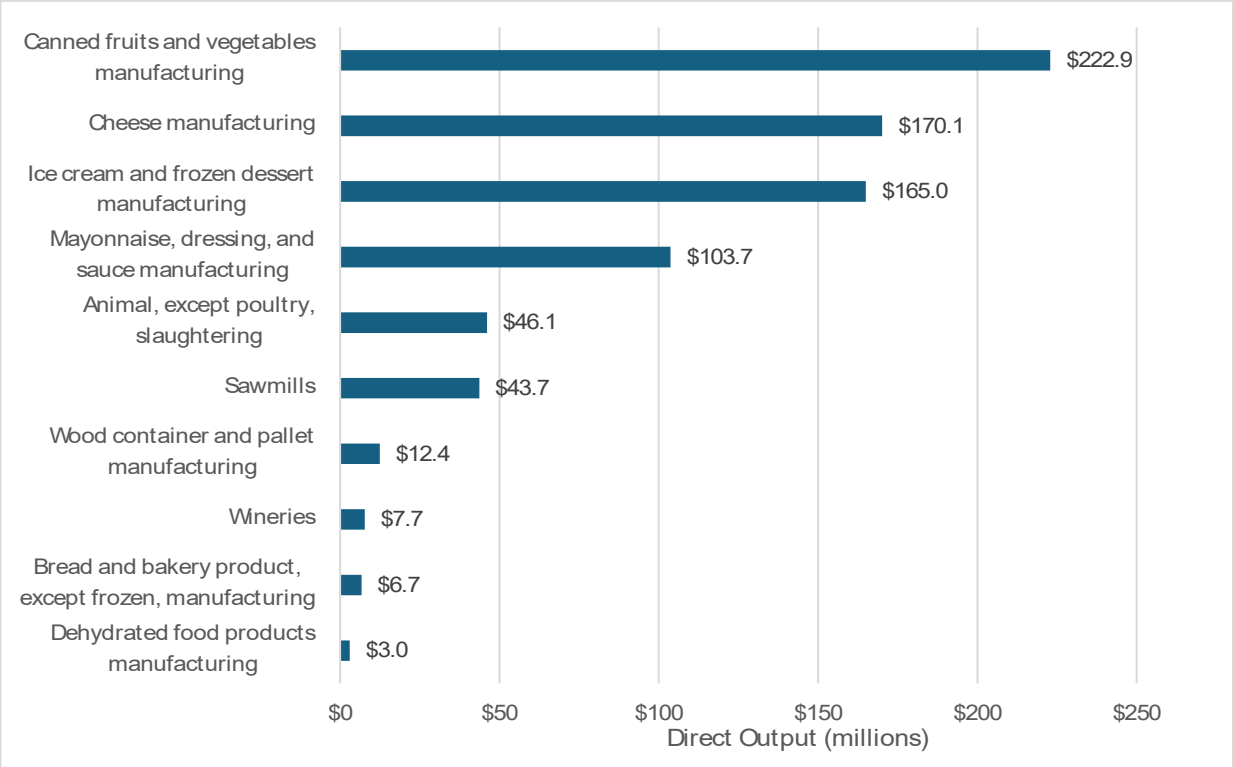
in Lake County

Mason County

In **Mason County**, there are

13	$784M	1,264
ag processing establishments	in annual sales of processed ag goods	jobs in the ag processing sector

The largest single sector in Mason County[i] is canned fruits and vegetables ($223 million, 28% of the total), no doubt driven by Indian Summer Cooperative Inc. which produces a variety of processed fruit products. However, the largest combined sector is dairy product manufacturing (cheese, milk, and ice cream) which together generate nearly $336 million in annual sales and support over 400 jobs in the county. The County also has a notable timber processing presence, with sawmills and other wood products manufacturing directly supporting about 130 jobs. Mason County has the second-highest number of indirectly supported jobs in the Five County Area (610), attesting to the important role the agricultural processing sector plays in purchasing supplies from the local area.



The **ag processing industry** supports

$105M	2,120	$36.7M
in labor income	jobs	in tax revenue

in Mason County

i These impacts do not include Mycopia/Gourmet Mushrooms Inc. since their operations are classified as food production rather than processing.

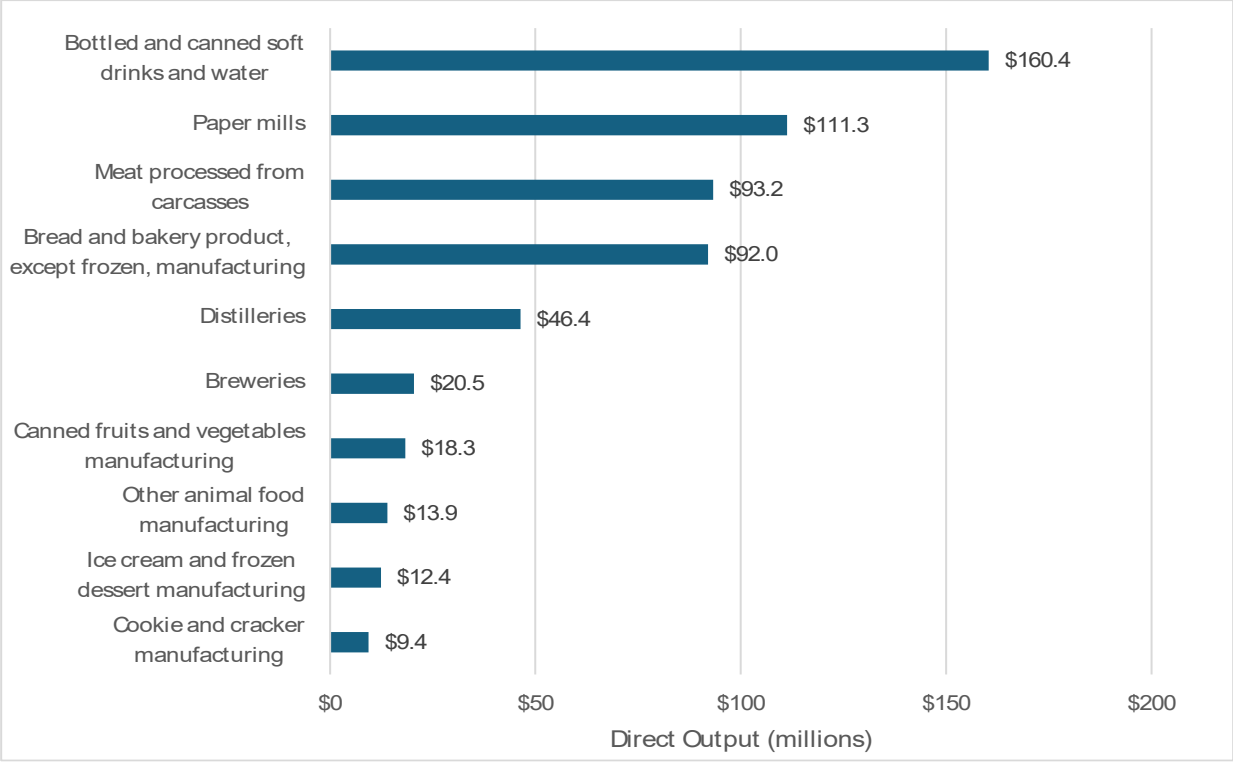
Muskegon County

In **Muskegon County**, there are

30	$608M	1,377
ag processing establishments	in annual sales of processed ag goods	jobs in the ag processing sector

The largest single-sector employer in Muskegon County is bread and bakery products, comprising 36% of all jobs in the industry. Soft drink manufacturing (driven by the Pepsi-Cola bottling plant[i]) is the next highest employer and the largest single source of output. Meat processing is also an important sector led by Hazekamp's Premier Foods.

Muskegon County has the second-highest amount of direct labor income from the agricultural processing industry in the Five County Area. It also has the highest amount of induced jobs and income, which indicates that, of all the income supported by the agricultural processing industry, the largest portion is spent in Muskegon County. The county also has the highest level of local tax revenues ($6.5 million), which highlights the value of the agricultural processing industry in supporting local government.



The **ag processing industry** supports

$117.5M	2,010	$50M
in labor income	jobs	in tax revenue

in Muskegon County

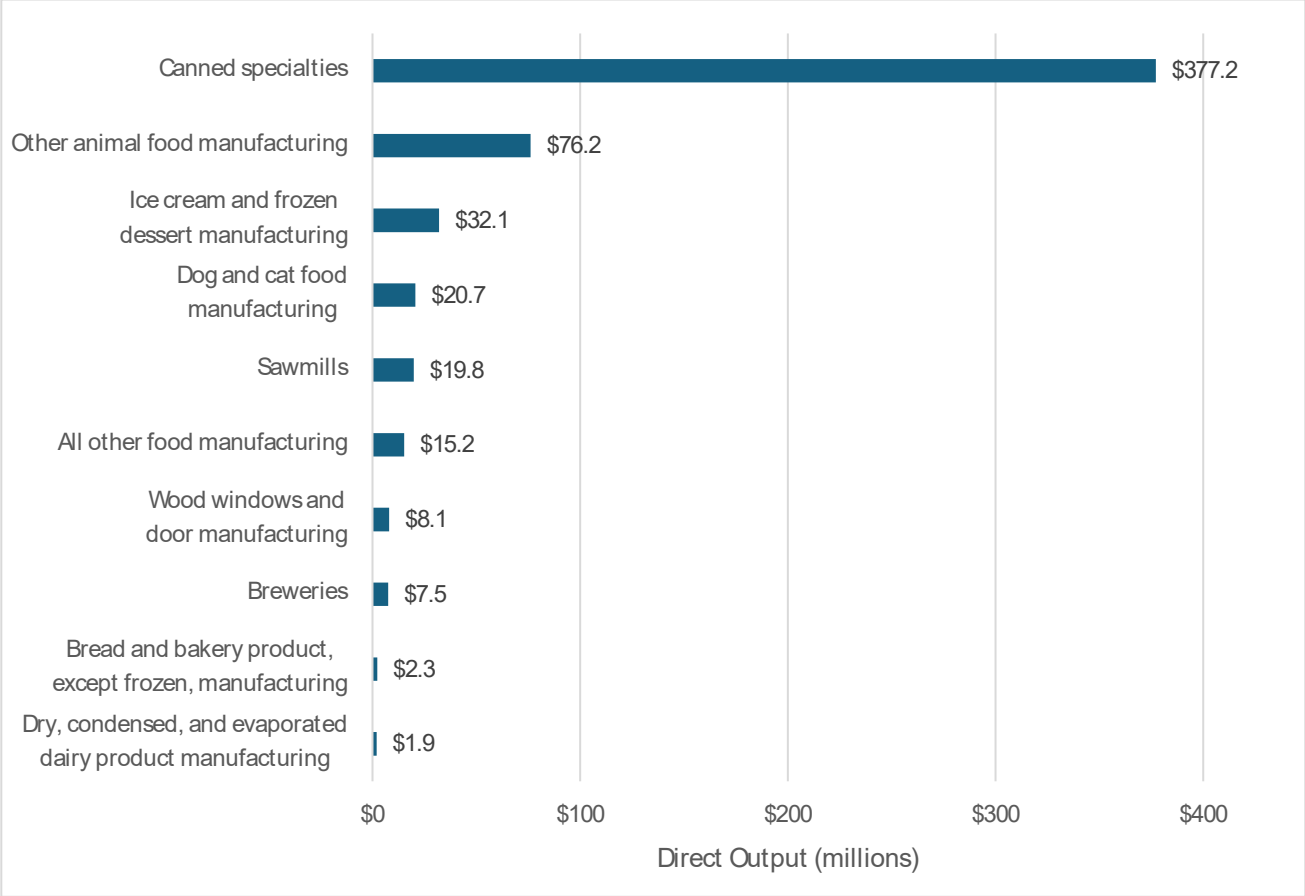
i Pepsi-Cola is not considered agricultural processing but was captured in the economic impacts because the soft drinking manufacturing sector was included in the list of relevant sectors.

Newaygo County

In Newaygo County, there are

>9	$563M	837
ag processing establishments	in annual sales of processed ag goods	jobs in the ag processing sector

Two-thirds of the annual sales and 60% of the agricultural processing jobs in Newaygo County are in the canned specialties sector. This is undoubtedly driven by Gerber Foods' factories in Fremont. Animal food manufacturing is also an important economic driver, generating nearly $97 million and supporting around 70 jobs. Newaygo County has the second largest amount of induced labor income in the Five County Area ($32.7 million), which highlights the importance of the agricultural processing industry in buying from local businesses.



The ag processing industry supports

$70M	1,530	$22.3M
in labor income	jobs	in tax revenue

in Newaygo County

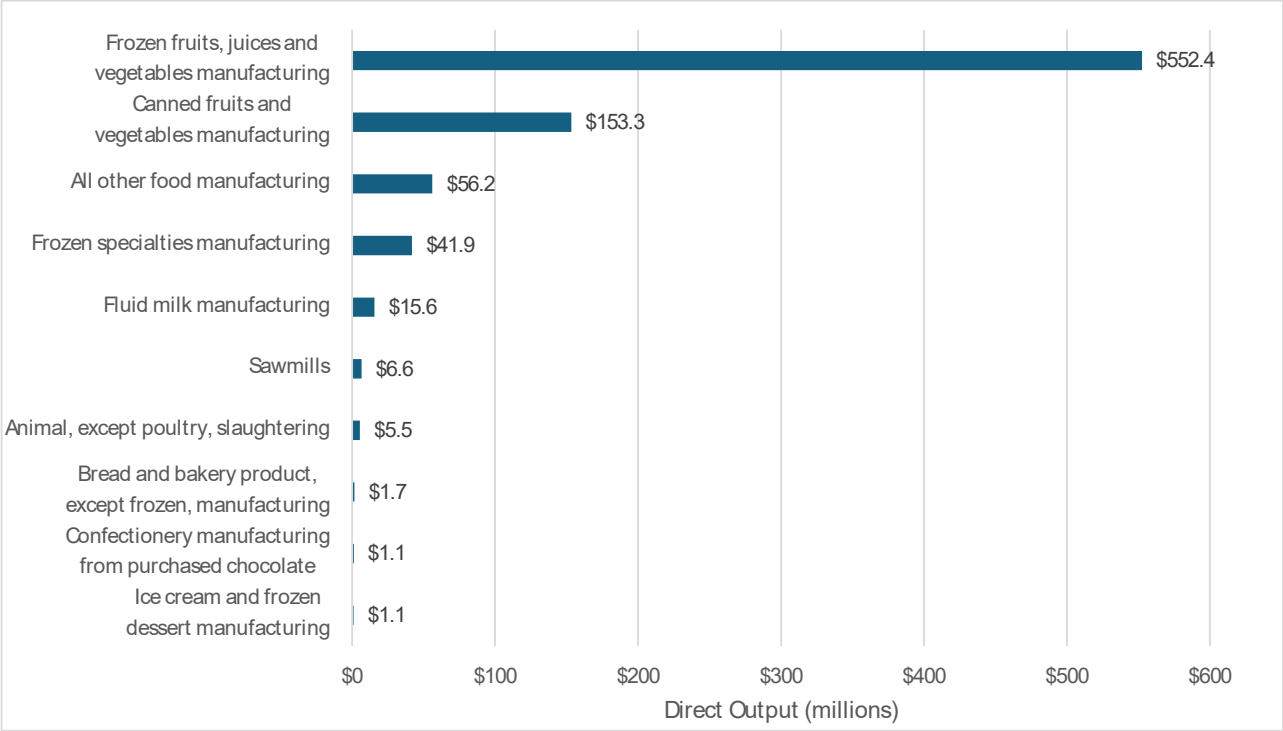
Oceana County

In **Oceana County**, there are

>13	$837M	1,906
ag processing establishments	in annual sales of processed ag goods	jobs in the ag processing sector

Oceana County has the largest agricultural processing sector (in terms of direct output) in the Five County Area. Its largest processing sectors reflect the county's strong fruit and vegetable production; canned, frozen, and other processed produce generates nearly $748 million in annual sales and directly supports almost 1,500 jobs. These sectors are led by large processors that include Burnette Foods, Seneca Foods, Peterson Farms, Arbre Farms, and Perdue Farms. The Other Food Manufacturing sector is also a large employer (over 300 jobs).

The large agricultural processing sector makes large economic waves in other sectors in the county. Oceana has the largest amount of jobs (960) and income ($36 million) that are indirectly supported by the industry, which speaks to how critical it is to other businesses and workers in the area. It also has the highest amount of tax revenues (both locally and in total), highlighting the importance of the industry to supporting government services.



The **ag processing industry** supports

$155.6M	3,080	$54.5M
in labor income	jobs	in tax revenue

in Oceana County

IV. Market Analysis of the Ag Processing Industry in Michigan

This market analysis explores the potential of growing West Michigan's agricultural processing sector, examining the factors that influence the potential for growth and the opportunities that appear most viable.

Market Factor: Labor

Labor is a constraining factor on industry growth due to:

- **Availability**: Limited labor pools
- **Cost**: A significant expense that continues to rise
- **Skills and education**: Workers lack the necessary skills and education and there is a shortage of workers skilled in the trade fields

Both agricultural producers and processors have cited labor issues as an important constraint to growing their operations. These issues include the quantity of available labor, the cost of labor, and the amount of labor (i.e., skills and training). Several factors confound labor problems, including the availability of affordable housing and childcare, the expense of the H-2A program, rural demographics, and a lack of training and educational programs.

Labor Availability

The rural nature of West Michigan is a natural limitation on the local labor pool. Coupled with low unemployment and labor force participation rates, employers in West Michigan find it difficult to fill open positions. For agricultural producers, the shortage of local labor has made them heavily reliant on migrant labor and the H-2A program, specifically. Retention has also been a problem for employers in the area.

Use of H-2A workers in Michigan has risen 50%[1] in the last five years, indicating the agricultural labor pool is constrained.

To solve the housing and childcare shortages of their employees, Peterson Farms built workforce housing and subsidized childcare. They also provide transportation services.[2]

Lack of Affordable Housing and Childcare

In surveys and interviews with processors, these were commonly cited as factors that contribute to a lack of workers. Childcare in the area costs roughly $25,000 per year. The shortage of housing particularly impacts lower income families and first-time home buyers.[3] Workers that cannot afford housing will not move to the area, and workers that cannot find affordable childcare cannot work.

Labor Costs

- Wage rate of H-2A labor increased 46% between 2018 and 2024.[1]
- H-2A labor has additional overhead costs, such as mandatory housing and transportation requirements.
- At least one processor indicated in our survey that wages were too high to keep business profitable.

Skills, Education, Training

- Previous studies of ag business employers have revealed the need for more ag tech education/ training.[4,5,6]
- The need for bilingual skills and training.
- Skill sets that are in short supply: journeyman meat cutters, food processing workers, electricians and plumbers, and long-haul truck drivers.
- West Michigan Works! posts an annual list of "Hot Jobs" that identifies jobs that in high demand, along with the typical salary range. The 2025 list included a range of positions in the 'agribusiness' industry.[7]

Possible methods to support labor

- Support zoning reform and local governance agreements that can streamline the process for affordable housing development.
- Offer educational programs that fill gaps in skill sets.
- Continue to market the job opportunities in food processing and trade work (Michigan Works!).

Possible threats to the labor force

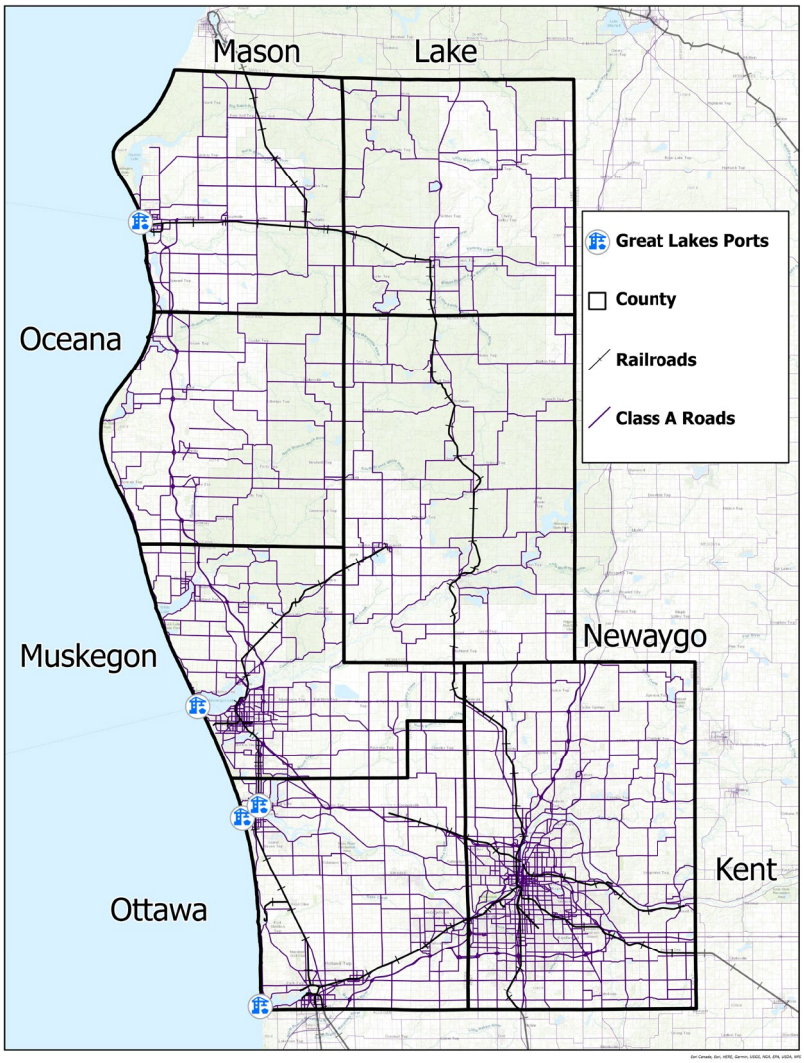
- The state has not provided funding for vocational technology programs at the high schools level since the 1990's.
- Immigration enforcement could further decrease the supply of agricultural labor.
- Economic uncertainty and tariffs could keep housing costs high for the foreseeable future.

Market Factor: Transportation

Transportation networks are an essential component of supporting agricultural processing, and can be a deciding factor in whether businesses can operate viably in an area.

The capacity and capability of roads is a critical factor to the agricultural processing industry in West Michigan. Large processing operations require roads that allow tractor-trailer transport and can facilitate the inflow of raw materials for processing and the outflow of finished products. Year-round operations need Class A roads that can handle freight travel during all seasons, which is not the case for many roads in the five-county area of West Michigan that restrict travel in the spring in order to avoid road damage.

- The study area generally has good transportation networks, with one-day access to major markets (Chicago, Detroit, Indianapolis, and Cleveland)
- The network allows for effective transport of perishable goods such as fresh produce
- The area's peninsular geography can increase transportation costs for some supply chains
- The areas two ports (Ludington and Muskegon) could theoretically be used to facilitate transport of agricultural raw materials and processed products, but would require both regulatory changes and investment
- The rail network in the region is generally good, although this has less of an influence on the agricultural processing industry than trucking



Public Transportation

The availability of public transportation affects employees' ability to work and live in area, especially for low-income individuals. Both producers and processors have stated that a lack of public transportation constrains their ability to hire workers. One large processor (Peterson Farms in Oceana County) provides its own transportation for workers to overcome this constraint.

State Weight Restrictions

Michigan has the highest gross vehicle weight (GVW) allowance in the continental U.S. (164,000 lbs compared to 80,000 lbs for many states) but also has the most restrictive weigh limits per axle (18,000 lbs per single axle compared to 20,000 lbs for many states).[8] This regulatory structure allows for heavier loads as long as the weight is spread across more axles. For processors, this can lower in-state transportation costs compared to other states. However, interstate travel may be more difficult for Michigan processors, as products shipped from Michigan would have to comply with the state's more restrictive per-axle limit and also comply with other states' more restrictive GVW limits.[2]

Possible methods of supporting transportation

- Conduct studies that examine the costs and benefits of various public transportation options
- Support initiatives to maintain and expand the network of Class A roads in the region
- Support initiatives to examine how the area's two ports (Ludington and Muskegon) could be improved to facilitate transport of agricultural products

Muskegon State Park; photo by Tyler Leiprandt & Michigan Sky Media LLC via Michigan DNR

Market Factor: Cost of Utilities

Food and agriculture processing can be energy-intensive, relying heavily on utilities like natural gas and electricity for operations such as heating, drying, operating large scale processing equipment, and refrigeration among others. With industry profit margins of ~5% and utility costs accounting for ~15% of operating costs[9], there is strong incentive for processors to regularly evaluate utility costs.

Michigan's Department of Environment, Great Lakes, and Energy (EGLE) issues permits for wastewater discharge on agricultural lands. **More stringent enforcement of surface water discharge has led to increasing reliance on municipal wastewater systems.**

The affordability and access to utilities like electricity, natural gas, and municipal wastewater systems necessary for agriculture processing influences economic development opportunities and siting decisions.

Electricity

Michigan's average electricity industrial rates (8.62 cents per kWh) are **higher than competitor regions** (less than 7 cents in Southern States)[10], but rate options for large industrial users and through economic development programs are available, and considered to be competitive tools for attracting investment in food processing. These include:

- Michigan Public Service Commission approved special economic development rates.[11]
  - » Consumer Energy can offer rates between 4 and 5 cents per kWh for users consuming 35 megawatt hours (MWh)
  - » DTE Energy offers rates as low as 4.3 cents per kWh for users consuming 50 MWh
- Several projects across the area have received USDA Rural Energy for America Program (REAP) grants including anaerobic digesters and photovoltaic solar[12]

Natural Gas

Michigan's industrial gas prices have remained elevated compared to the national average. In November of 2024, the average industrial price for natural gas was **$7.32 per Mcf across the state of Michigan**, while the national average was $3.35 / Mcf.[13]

Wastewater System

Muskegon Resource Recovery Center (MRRC) pipeline project from Coopersville to Muskegon is expected to provide food and agriculture processors a viable pathway toward compliance with EGLE discharge regulations, as well as cost savings from hauling waste water currently. The MRRC receives hauled or piped water used for washdown, processing waste, blood trap waste, and more from many agriculture processors in the region and beyond.

Market Factor: Regulations

Food and agriculture processing operations need to navigate several regulations, including permitting and zoning a site, food processing licenses and food safety plans, discharge permits and others depending on the nature of processing involved.

A 2010 Economic Impact Analysis of Food Processing in Michigan identified **wastewater treatment and handling as the primary barrier** affecting food processing development in the state.[14] Several stakeholders reiterated this sentiment during interviews in 2025.

In western Michigan there are **five layers of government** (municipal, township, county, state, and federal), each with a specific responsibility to protect public resources and enforce rules surrounding zoning, building codes, food safety laws, worker safety laws, wastewater discharge, and other relevant statutes.

Site Development

County, township and municipal governments all have a say in zoning ordinance and permitting processes.

- **Townships** typically handle zoning and land use for rural areas
- **Cities / villages** (municipalities) have their own zoning codes, which can differ from neighboring jurisdictions
- **Counties** generally play a lesser role in zoning unless a township has opted out of having its own zoning.

This creates a patchwork of rules that businesses must navigate, particularly if they're considering locations across jurisdictions. Because of the multiple jurisdictions, one parcel may be under different jurisdictions for zoning, building inspection, road access and utility service.

Challenge: Inconsistent Policies on Economic Development

Local governments may differ in:

- Attitudes toward development (e.g. agri-tourism vs. tourism vs. residential growth)
- Zoning allowances for uses like food processing, renewable energy, or warehousing
- Infrastructure investment and readiness

Examples

1. Ag Processing Restricted

Producers in Hart (Oceana County) may be allowed to farm but may need a special use permit (SUP) or even rezoning to install a processing facility on existing farmland, depending on facility placement and the amount of product grown on their own farm.[15] *Example: A fruit grower could face **months of delay**, **public hearings**, and **possible rejection** of post-harvest handling and processing activities if they do not meet zoning ordinances.*

2. Time Lags

Some Townships in the region contract out inspections to private firms, or share inspectors across several jurisdictions. This may result in limited availability and delays in plan review or inspections, especially during peak construction seasons.[16] *Example: A cold storage addition to a dairy processor in Lake County could be delayed due to inspection gaps where there are **inspection backlogs** for commercial purposes.*

3. Migrant & Seasonal Worker Housing Permits

Permitting for on-site worker housing involves multiple agencies and regulations, including zoning approvals, health department inspections, and state licensing. Agricultural labor housing is regulated by the Michigan Department of Agriculture and Rural Development (MDARD), requiring applications at least 30 days prior to occupancy and adherence to specific standards.[17] *Example: A blueberry farm and packer in Newaygo County could be **forced to house fewer workers** than needed due to slow permitting for septic upgrades and inconsistent interpretation of density rules.*

4. Ambiguous or Outdated Zoning Ordinances

Some townships have not updated their zoning codes in many years, leading to confusion over definitions and classifications for agricultural processing facilities.[18] *Example: A cheese producer in Muskegon County may have to seek a variance because the zoning code **didn't classify dairies with retail operations**, leading to confusion over parking, traffic, and signage rules.*

5. Attitudes Toward Development

Even where zoning allows agri-processing, public pushback and disconnects between county planning and township boards can create bottlenecks. *Example: In Oceana County, a proposed agricultural housing project faced **delays due to differing interpretations** of permit requirements between MDARD and local authorities.[19]*

Challenge: Wastewater Discharge Regulations

The rules and regulations for wastewater discharge can present hurdles for food and agricultural processing operations.

Examples

1. Stakeholder Complaints

Interviews with stakeholders involved in the food processing sector commonly identified overly burdensome regulation(s) associated with wastewater discharge as a hurdle to maintain existing processing capacity or expand production. *Several interviewees remarked that inspectors and EGLE representatives were hard to work with and "combative" at times.*

2. Water, Wastewater and Septic Approvals

Many townships lack municipal sewer and water systems, requiring processors to rely on wells and on-site treatment systems. The Michigan Department of Environment, Great Lakes, and Energy (EGLE) oversees industrial wastewater discharge permits, which can be time-consuming. Food processors must obtain appropriate permits from EGLE for wastewater discharge, which involves a public notice period and potential for extended review times. *Stakeholders mentioned in interviews that some outstanding violations persist for **multiple years** due to difficulties with acquiring the right permits.*

EGLE

Data from EGLE suggests the rate of violations per evaluation has risen over the past 14 years.[20] The chart to the right displays violations per evaluation for the Division of Water Resources which covers groundwater permits and National Pollutant Discharge Elimination System (NPDES).

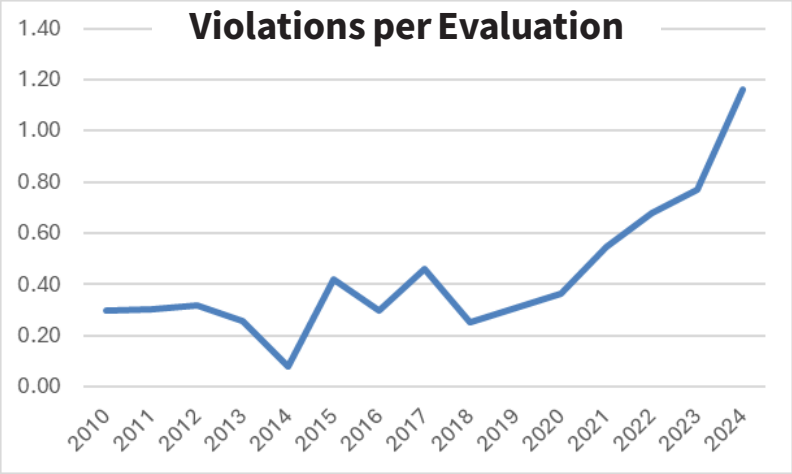


Table of Known Challenges by County

County	Number of Townships	Known Challenges
Mason	15	Rural zoning, septic regulations, seasonal use issues
Lake	11	Sparse staff, low development pressure, land conservancies
Newaygo	24	Cannabis zoning conflicts, ag land preservation tension
Oceana	16	Migrant housing permits, farmland use conversion
Muskegon	16 + multiple cities	Urban-rural contrast, layered permitting, shoreline restrictions

Opportunities to streamline regulatory compliance

- County-wide GIS platforms can improve access to zoning data (some counties already use BS&A or similar systems).
- Inter-local agreements or unified development codes could harmonize zoning and reduce friction.
- Pre-development meetings with regional planners (e.g., WMSRDC, Right Place) can help coordinate across jurisdictions and potentially improve relationships between farmers, processors, and the general public.

Brightmark gasification plant; photo by Highland Economics

Opportunity: Agritourism

Agritourism allows producers and processors to increase revenue and diversify their income sources, increasing economic resilience and adding value to products.

Agritourism is an increasingly popular method of adding value to agricultural production and processing. One common example is an apple farm that processes some of their crop into cider and caramel apples and sells those products directly to customers from a farm stand or farmers market. **Agritourism often combines sales of fresh and value-added products with farm-based entertainment and education.** This business model has grown in popularity both nationally and in West Michigan.

Local examples of agritourism include:

Lewis Adventure Farm & Zoo (Oceana): Offers amusement park attractions and rides, prepared food for sale, interactive experiences with exotic animals, special events, and a market that sells fresh produce, baked goods, and sweet treats.

Country Dairy Farm Store (Oceana): Visitors can get a tour of the farm or shop in the market, which offers dairy products made from their own milk, as well as other packaged and prepared food products, souvenirs, and games.

House of Flavors (Mason): This ice cream maker boasts 3,400 different recipes and makes 28 million gallons of ice cream each year. It also hosts a full service restaurant at their production facility, where each meal comes with a free dish of ice cream in the flavor of your choice.

Jawor Brothers Country Store (Muskegon): Co-located at their blueberry farm, this store sells fresh and frozen blueberries and value-added products that include jams, sauces, baked goods, ice cream, as well as a selection of local products and souvenirs. The farm also offers U-pick.

Heritage Farms Market (Newaygo): Offers fresh produce and baked goods, as well as a variety of entertainment options that include a corn maze, hay rides, a children's activity area, a petting zoo, and a pumpkin patch. The farm also provides tours for school groups.

Agritourism ventures can include:

- Farm stays and glamping
- On-farm dining experiences
- Winery/brewery events
- Corn mazes, pumpkin patches, and petting zoos
- Workshops and classes
- Festivals and events tied to harvest cycles

The Michigan Agritourism Association (which maintains a statewide directory of agricultural tourism opportunities) lists **58 destinations in the West Michigan region.**[21] The net number of operations with ag tourism receipts in West Michigan increased by 29 between 2002 and 2022, with significant increases in Newaygo County (22 new operations) and Mason and Oceana counties (13 total new operations), while Lake and Muskegon counties saw decreases.[22] Total income from ag tourism and recreational services in west central Michigan **increased by approximately $900,000 between 2002 and 2022**, led by Oceana ($1.1 million net change) and Mason ($85,000), with decreases in Lake, Muskegon, and Newaygo. Statewide, agritourism operations and income have risen, with significantly larger growth in central, northwest, southeast, and southwest regions compared to west central Michigan.[22]

Methods for supporting agritourism

- Create, support, and promote marketing campaigns and events for local agritourism events
- Where needed, enact and support zoning reform that will allow for development of agritourism businesses
- Produce and distribute educational materials that can inform growers and processors how to expand their agritourism initiatives

Possible threats to agritourism

- Zoning laws and local governance structures that restrict agritourism businesses

Michigan farm tractor ride; photo by Michigan DNR

Opportunity: Capturing Value-Added Processing

West Michigan is rich in agricultural production, but many of the products leave the area for processing. These exports represent potential opportunities to expand the local processing sector.

Currently, large amounts of raw agricultural products produced in the five-county region are sent to other areas for processing. **If these products were processed in the five-county area, it would support economic activity in the form of jobs, income, and tax revenues.** Ultimately, the decision to establish processing lies with the companies manufacturing the products, but by bringing awareness to the raw inputs that are leaving the region, it is possible to promote those exports as an opportunity for fostering greater economic activity within the region.

Agricultural Products that are Often Exported for Processing

Peaches: Currently, the five-county region has around 700 acres of peaches at an estimated farmgate value of $6.2 million.[22] Processing peaches are mainly purchased by Titan Foods and trucked over 800 miles to South Carolina for processing. Through their sister company, Palmetto Processing Solutions, the company creates frozen slices, dices, and purees.[23,24]

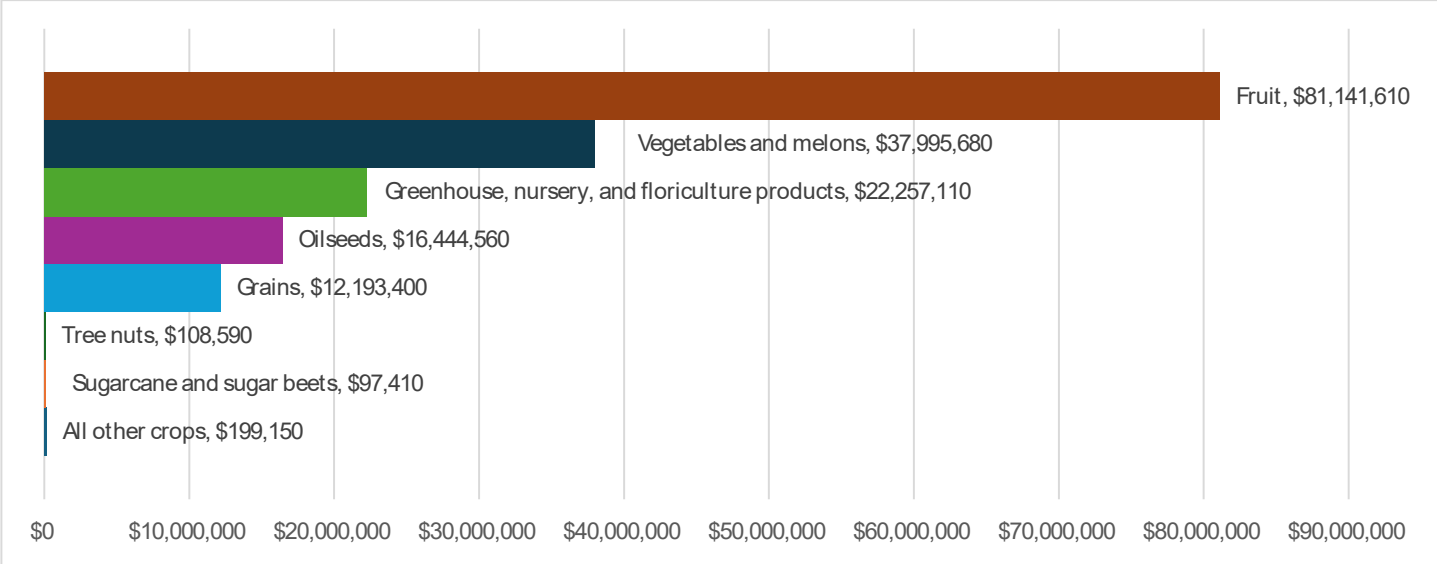
Animals: The five-county region contains more than 70,000 hogs & pigs and over 56,000 cattle & calves (about 5-6 percent of the state's total inventory). Sales of these animals total roughly $95 million annually.[22] Michigan cattle are often transported to large Midwestern packing plants. Hogs are often trucked to other parts of Michigan for processing or to plants in Indiana or Illinois.

Milk: That area's single most valuable agricultural product is milk, with annual sales of about $140 million per year. Some of this milk is processed in the five-county area at House of Flavors (into ice cream) and by the Country Dairy Farm Store, but a significant portion goes to the large dairy processors just outside the five-county area: Continental Dairy and Fairlife in Ottawa County.

Grains: There are roughly 80,000 acres of corn and wheat in the five-county area.[22] Much of this leaves the area for processing. The region has vibrant sectors that could benefit from locally processed grains: animal foods manufacturing, bakery products, breweries, and distilleries, which together support over 800 jobs and produce nearly $300 million in revenue each year.[25]

Asparagus: Around 80 percent (about 7,800 acres) of asparagus in Michigan is harvested each year in the five-county area.[22] Most goes to the fresh market but some is processed. While some local processing exists, it is not always sufficient to handle the supply. The lack of local processing, for lower grade spears especially, has led to wasted product in recent years.

The IMPLAN model of the local economy includes estimates of the value of raw agricultural goods exported from the region.[25] While these figures do not represent the precise value of exported goods, the estimates provide an indication of the magnitude of exported goods, as illustrated in the graph below. These values also provide an indication of the potential for increasing value-added processing of these goods in the local area.



Possible threats to value-added processing

- Recent consumption trends have favored fresh produce over processed products
- Production in the region may not be big enough to take advantage of economies of scale and support a commercial sized processor
  - » The area previously hosted processing facilities for peaches and asparagus, but these facilities closed operations, indicating that the industry may not economically viable
  - » Recently, a nearby cheese plant closed, a possible indication that dairy manufacturing economics are unfavorable[26]
- The presence of large milk processing in neighboring counties may make it more difficult for a new milk processor to establish in the area

Country Dairy Farm Store; photo by Highland Economics

Opportunity: Dairy Product Manufacturing

Dairy is the leading agricultural sector in Michigan, accounting for **$24 billion in economic activity** annually, or **5% of the states Gross Domestic Product** (GDP).[27] West Michigan counties of Newaygo, Muskegon, and Mason play key roles in statewide production. Michigan's dairy cows are the most productive in the country, averaging **over 27,000 pounds of milk per cow annually** - well above the national average.[28]

The area's moderate land prices, abundant forage, proximity to feed (corn and soybean meal) sources, and area's anaerobic digesters allow for cost-effective dairies relative to western and coastal regions. **Michigan's climate, tempered by Lake Michigan, reduces heat stress and contributes to its industry-leading milk yields per cow.** With increasing drought frequency and water regulation in the west, dairy operations are expected to migrate toward water-rich regions like the Great Lakes over the coming decades.

In the mid 2010's, Michigan's milk production had outpaced processing capacity which led to costly milk dumping and out-of-state hauling.[29] **Since then, major investments in dairy processing reshaped west Michigan's dairy product sector,** including a notable expansion at Continental Dairy, which is now able to process 6 million pounds of milk per day. This operation is located in Ottawa County, and will soon be connected to the Muskegon County Resource Recovery Center (MRRC) wastewater pipeline.

Productivity & Efficiency Gains

Dairy farming efficiency has been driven by technological advancements, improved management practices and consolidation of dairy operations into larger more efficient farms. **In western Michigan in particular, the presence of commercial anaerobic digesters has assisted with these efficiency gains at the farm level.** Anaerobic digesters create revenue streams from dairy waste, and convert the farm waste to bedding material and fertilizer used on the farm. The natural gas captured is then piped into the TransCanada Pipeline. Financially, the project relies on the sale of the gas and carbon credits to be viable.

As dairies in western Michigan capture additional revenue streams and economies of scale, the region will be more competitive in terms of cost of milk production, a critical input to dairy product manufacturing. However, as dairies become larger environmental concerns increase. Opponents argue there is insufficient land to spread digestate generated from these plants and water quality in the region will suffer.

Dairy Product Consumption

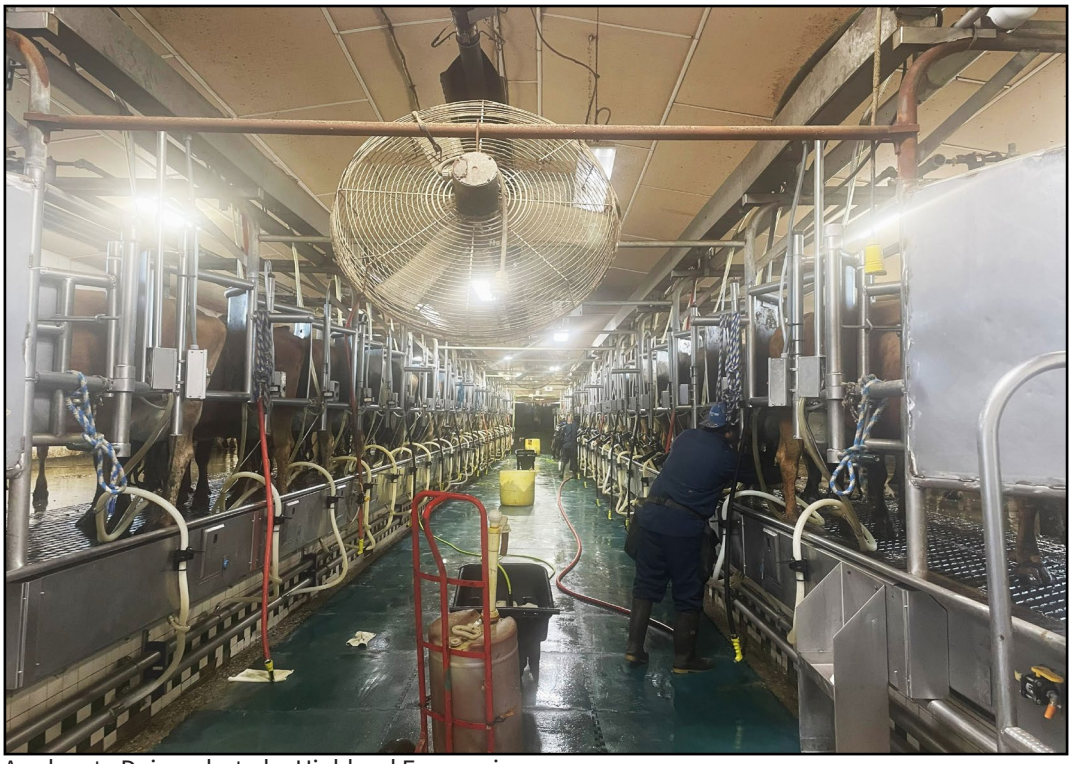
Between 2013 and 2023 US consumption of dairy products **increased at 1.45% annually** (on a milk-fat milk-equivalent basis). This increase was fueled by rising demand for cheese, with the following contributing factors[30]:

- More varieties of cheese available to consumers in the US
- Increased consumption in away-from-home dining / eating settings
- Greater popularity of ethnic cuisines that incorporate cheese as a key ingredient

On the other hand, per capita consumption of fluid milk has declined. The primary reason for this decline has been attributed to competition from alternative beverages and demographic shifts.[30]

Export Opportunities

The dairy industry has seen growth in exports recently. **In 2024, dairy exports reached $8.2 billion, marking the second highest total on record**. Cheese exports, in particular, achieved a 17% growth from the prior year to 508,000 metric tons. Key markets to this growth include Mexico, Central America, South America and the Caribbean. Expanding export capabilities can enhance economic development prospects in dairy product manufacturing.[31]



Applegate Dairy; photo by Highland Economics

Opportunity: Import Substitution

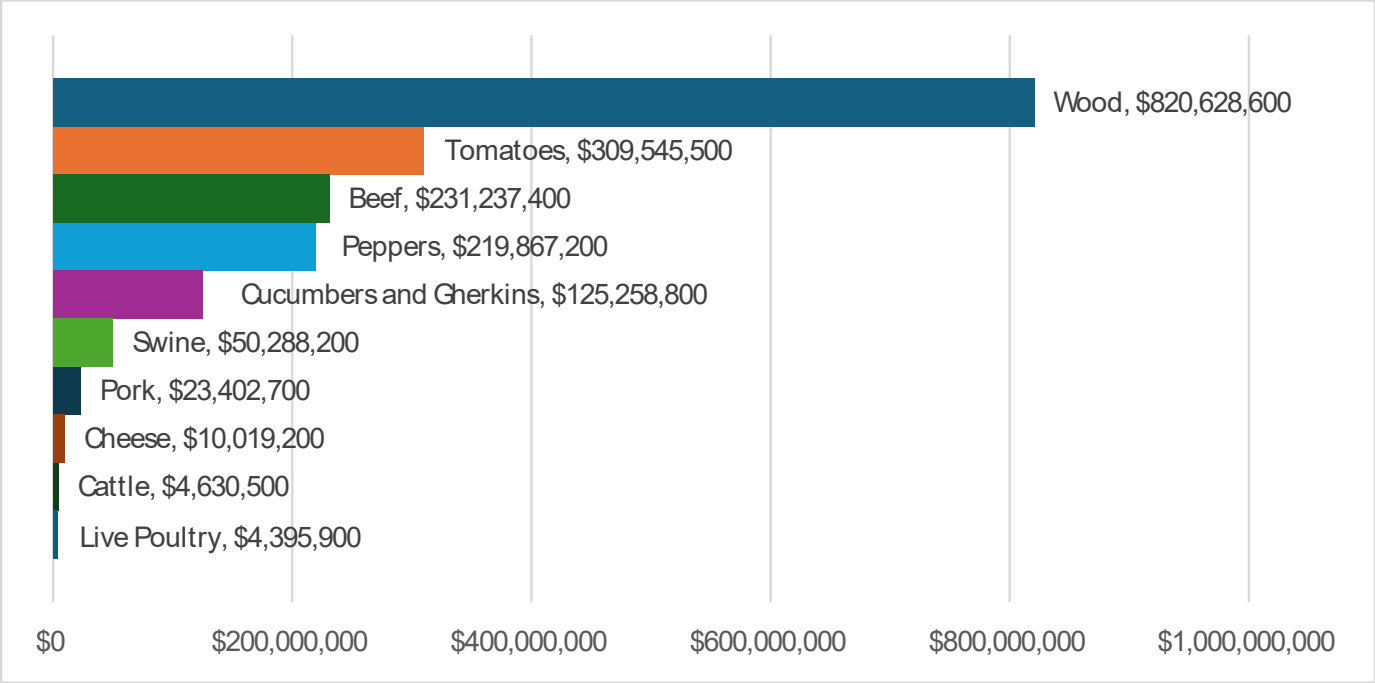
The concept of import substitution is simple: reduce dependence on imports by promoting domestic production of goods, thereby achieving greater self-sufficiency. It is most often used by developing countries to boost industrialization and economic growth. We evaluate the key crops where this opportunity could be implemented in western Michigan and discuss trade-offs here.

By producing and sourcing more key raw material inputs locally, processors will reduce vulnerability in supply chain disruptions, support rural economies and food security and lay the foundation for future exports (where relevant).

Agriculture production is highly variable, being dependent on weather and other uncontrollable factors. Processors relying on agricultural inputs can spread production risk through sourcing from multiple areas.

Value of Agricultural Goods Being Imported

The average value of annual imports to the State of Michigan from the U.S. Census Bureau, between 2020 and 2024 by agricultural commodity, are summarized below.[32] Only the top ten (highest value) agricultural products are presented here:



Critiques to Import Substitution

There are a multitude of factors why western Michigan may not be well suited to production of some of the above-mentioned products such as tomatoes. The climate, production practices and infrastructure needed to produce these crops in large volumes may be lacking. Expanding production in some of these areas could possibly lead to inefficiencies and higher costs to processors in the end and a reliance on government supports or policies (e.g. tariffs) to maintain a competitive advantage against other regions. Further, the data above is compiled into broad categories by product but demand from processors and distributors will be specific to variety and quality specifications. Lastly, processors can be dependent on imports for production when local production is out of season. In these cases, substituting local production for imported products may not be possible.

Potential Impacts of Substituting Imports

The list above identifies **nearly $1.8 billion of agricultural goods being imported into Michigan** across 10 agricultural and forestry commodities. [32] These products were produced elsewhere, and that activity supported jobs and income in other parts of the world. With the current nature of international trade involving high tariffs and counter-tariffs, the cost of these imports to processors is likely to increase in the near term, making future access to these goods uncertain. Increasing production and manufacturing capabilities for these products locally, where possible, would **encourage local development, reduce reliance on imported goods, and stimulate local production and employment**. Enhancing economic development through substitution of imports is most effective when supported by investments in education, infrastructure and research and development (R&D).

Assorted berries; photo by Michigan DNR

Opportunity: Local and Niche Markets

West Michigan has significant opportunities to leverage quality, local, and sustainable attributes of its agricultural processing products due to a combination of **favorable natural resources**, **established industry**, and **evolving consumer preferences**.

Local Demand

Consumers are increasingly interested in local food as it aligns with their geographic "local food identity", a phenomenon leveraged by emphasizing the cultural importance of a product in Michigan through marketing.[33] Differentiating products as local or unique in quality can also help compete against import competition.

The Michigan Ag Council advocates for and offers marketing support for "Michigan Grown, Michigan Great" products through a membership program seeking to broaden consumer awareness of agriculture in the state.

The Michigan Good Food Charter outlined goals such as ensuring 20% of Michigan's food purchases come from Michigan sources and expanding access to healthy food across all communities[34], and similar future opportunities represent a key opportunity for the industry.

Niche Markets

Specialty: While fresh consumption is important, opportunities lie in diversifying into processed products like artisan cheeses, hard cider, apple slices for snacks, frozen berry smoothies, and fruit juices/purees.

Sustainable & Healthy: Consumers increasingly look for sustainable or responsible product attributes on the shelf, like humane, fair trade, grass-fed, and pasture-raised to name a few.

Organic: There is potential for West Michigan processors to expand into the organic sector - growing at twice the rate of the total food marketplace - for products like apples and blueberries.

Unique: Product attributes specific to Michigan can differentiate products and help compete against import competition.

In 2022, over **$45 million in sales** in West Michigan were from **local or regionally branded products** sold direct to consumer or through retail or wholesale channels, approximately 8% of the region's $600 million in total commodity sales.[35] Over **$5.5 million in Organic sales** in West Michigan represented just 1% of total commodity sales in the region.[35]

Opportunities for West Michigan Products

Local, High-Quality Fruit and Vegetables:

West Michigan's ideal micro-climate supports the production of high-quality fruits and vegetables. The industry can differentiate their product in the region through superior freshness and local branding, leveraging strong retail demand for locally-grown produce.

This advantage can apply to processed products as well as fresh, especially including "light processing", such as chopped or pre-packaged goods. Faced with increasing retail prices, nearly **40% of American consumers opt for fresh cut or value-added produce**.[37]

The Michigan Asparagus Advisory Board has invested in marketing campaigns to boost fresh sales and visibility for the state's product. Fresh asparagus consumption tends to spike in spring (particularly around Easter and Memorial Day cookouts), which aligns with Michigan's harvest window.

Sustainable and Responsible Meat and Dairy:

Hazekamp's Premier Foods holds Certified Humane, Grass Fed, and GAP certifications, meeting these consumer demands for ethical and sustainable products and undergoing strict third-party audits. Hazekamp's reports that its customers are pushing for more locally sourced meats.

There is growing consumer interest in locally raised, grass-fed, and "natural" beef, with over **80% of shoppers** looking for these attributes in grocery aisles, online marketplaces, and directly from producers.[38] Meat and dairy products raised in West Michigan can be marketed as originating from a region with natural rainfall and ample green forage, appealing to consumers interested in sustainability.

Michigan's proactive stance on animal welfare standards, such as gestation crate-free pork and cage-free eggs, can also provide a marketing edge by targeting retailers and states with strict requirements. Not only do a large majority of shoppers express concern for animal welfare, many are **willing to pay a premium** for these attributes.[39,40]

Specialty Products:

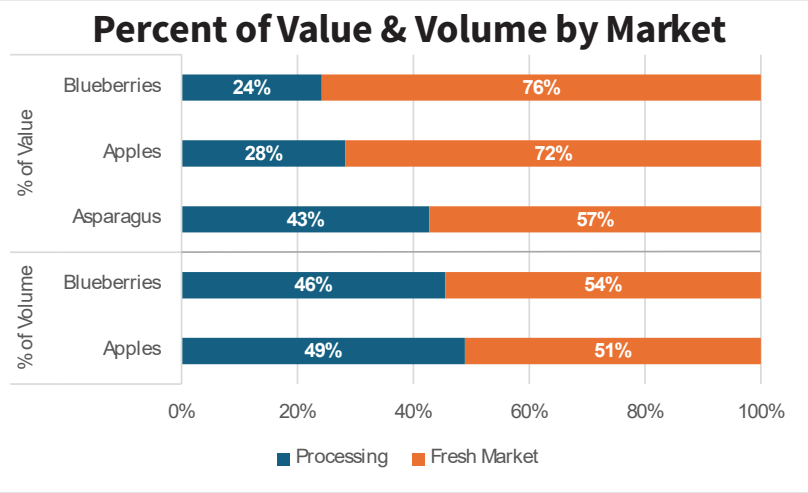
Michigan's unique climate and robust industry research makes it a strong innovator in the agricultural sector. With the most productive dairy industry in the state, **Michigan boasts over 100 dairy processing facilities, and ranks second nationally in the number of small, artisan, or specialty dairy processors**.[41] West Michigan can capitalize on this to market local cheeses, cultured products, and craft dairy foods, tying into regional agritourism and food culture.

Among the specialty products that West Michigan can expand to leverage niche, specialty markets are pickled asparagus and cucumbers, artisanal cheeses, fruit juice products, frozen, cubed, and spiralized vegetables, and cold-hardy nursery plants.

Michigan tart cherry growers utilize **"Cherry Capital"** branding to promote the unique growing conditions that make the state the leading producer of tart cherries in the country. Up against an increasingly saturated market, Michigan's strong reputation for quality tart cherries could be leveraged to promote increased domestic consumption, such as tart cherry juice marketed as a recovery drink. Developing late-season sweet cherry varieties can also fill a unique market window when other major producers are finishing their harvests.

Possible threats to local and niche markets

With growing demand for fresh and local agricultural products, there is a risk of undercutting the processing market. For some of Michigan's largest commodities, the processed market is a significant component of income and production volume, often representing nearly half of all production.[22]

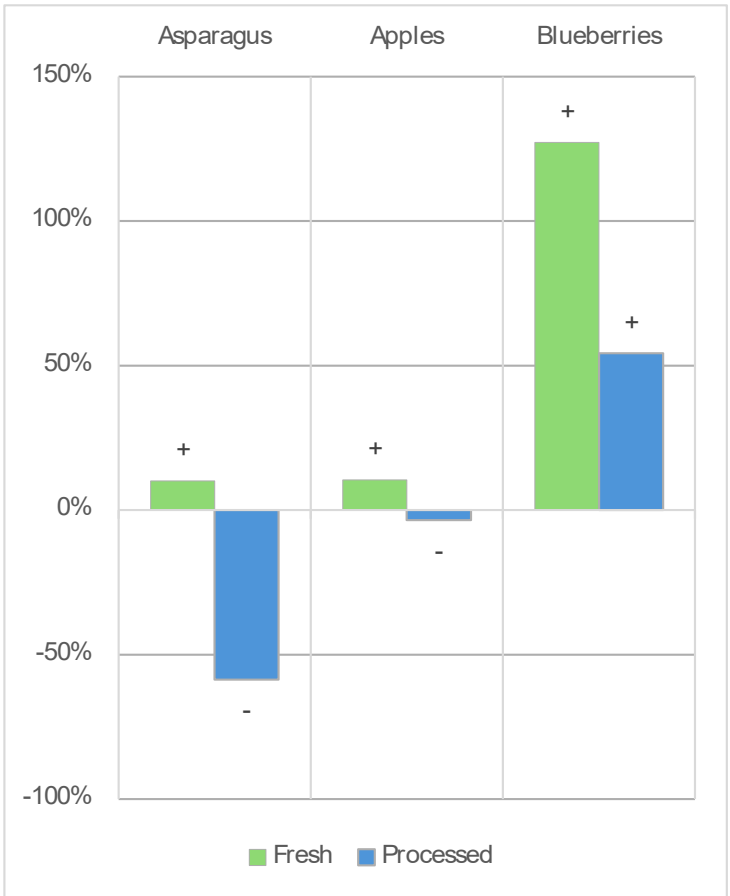


As consumers grow more accustomed to products available year-round, there is less reliance on preserved products available out-of-season. **Since 2020, consumers in the Midwest now spend 5% more on fresh fruits and vegetables and nearly 30% less on processed fruits and vegetables**.[42]

As shown in the figure to the right, the per capita availability of several processed fruits and vegetables, particularly in canned and juice form, have dropped in recent years.[43-46] Notably, the demand for frozen fruits and vegetables, particularly blueberries, have remained steady or grown in recent years.[43-46]

In emphasizing and expanding the availability of fresh, local, and sustainable agricultural products, West Michigan producers may need to account for increased consumer expectations of consistent and price competitive products year-round. The processing market is a crucial component of the agricultural industry in the region, and processors will need to adapt to external pressures and capitalize on the trends described above.

Change in Per Capita Availability of Select Crops[47]: 2010-Present[i]



i Asparagus: 2023; Apples: 2024; Blueberries: 2021

Opportunity: Greenhouse Production

By encouraging a cluster of winter greenhouse producers in western Michigan, proprietors may be able to **increase retention of their workforce** (by offering year-round jobs), **improve profitability**, and **improve the utilization of their infrastructure**.

According to the 2022 Ag Census there are just over 17 acres of greenhouses (under glass or other protection) in the Five County Area[i].[35] These operations are mainly focused on nursery crops with a peak use in the spring and early summer, while the fall and winter utilization rates are reduced and workforce is trimmed. Agriculture processing as well as some fresh market crops in several sectors could benefit from additional supply during this winter season.

A collection of studies on greenhouse conversion[36] found that **one 20,000 square foot facility** (less than half an acre) operating from October to May can produce:

- **40,000 lbs** of strawberries
- **180,000 lbs** of cucumbers
- **120,000 trays** of microgreens

Position Relative to an Industry Leader

There are several similarities in relevant conditions between western Michigan and Leamington in Southern Ontario, Canada. Leamington is a single municipality known as "Greenhouse Capital of North America" and is home to 2,500 acres of greenhouses as of 2023, and well established co-ops, growers, and global exporters operate there. The conditions that make Southern Ontario an advantageous greenhouse production area are explored below, compared to the study area:

1. Climate - West Michigan has a mild climate and more sunlight than Southern Ontario:[48]

Climate Metric	Leamington, ON	Muskegon, MI
USDA Hardiness Zone	6b to 7a	6a
Avg. Jan Low	~17°F (-8°C)	~18°F (-7.5°C)
Avg. July High	~81°F (27°C)	~80°F (26.5°C)
Frost-Free Days	~180–200 days	~160–170 days
Annual Precipitation	~36 inches (mostly rain)	~35 inches (includes more snow)
Sunlight Hours	2,857 hours	2,670 hours

[i] This likely undercounts the actual area under protection, as data for two counties (Newaygo and Oceana) are withheld for confidentiality purposes.

2. **Proximity to large markets - West Michigan is similarly central to markets like Chicago, Toronto, Montreal, and New York:**

3. **Long established agricultural infrastructure - Both areas are equipped with information and material resources:**
    a. Skilled labor and ag-focused education (University of Guelph in Ontario and Michigan State University Extension in Western Michigan)
        i. In an interview with a greenhouse producer, the main motivation behind expanding their production schedule is to retain more of their workforce year-round, so as to eventually increase retention over the long-run[49]
    b. Networks for distribution and logistics
    c. Food processing and packaging infrastructure nearby

4. **Affordable energy - Access to energy for greenhouse operations is available in both areas, but more supported in Leamington:**
    a. GH clustered near energy infrastructure or natural gas lines
    b. Leamington offers preferential energy rates or access to CHP systems, using waste heat and CO_2 to enhance plant growth
        i. Siting a greenhouse adjacent to processing activities with waste heat could be an additional opportunity for enhances profitability and expanding agricultural processing in the region
    c. Ontario Greenhouse Vegetable Growers (OGVG) has worked with utilities to address energy costs and sustainability goals[50]

5. **Access to fresh water - Both areas have plentiful access to the Great Lakes Basin and other freshwater sources.**

6. **Supportive policy and investment - Leamington offers more support for greenhouse producers:**
    a. There have been key policies and investments in Southern Ontario that have provided that region a comparative advantage in greenhouse production. This has included provincial and federal government investments in:

i. Research & Innovation (e.g. lighting, pest control, hydroponics)
   - In an interview with one greenhouse producer interested in expanding production through winter months it was mentioned how willing / available Michigan State University researchers were to assist in adjusting their production practices to support this concept[49]

ii. Expansion grants and incentives
   - Agriculture and Agri-Food Canada: Greenhouse Competitiveness and Innovation grant – up to 50% eligible expenses to a maximum of $1 million in funding[51]

7. Global and domestic demand - for both areas:

a. Rising demand for local, fresh, and pesticide free produce year round has driven greenhouse expansion
b. Controlled environment agriculture is desirable for producing more food with less pesticides

In summary, West Michigan shares much of the traits that make Leamington so well suited to large-scale commercial greenhouse production. Additional infrastructure, policy and funding support, and organizational opportunities modeled by Leamington can be considered as ways to maximize the potential for increasing the supply chain of fruits and vegetables - for both processing and fresh market - by expanding the use and production area of greenhouses in West Michigan.

Strengths

- Mild climate
- Access to water
- Plentiful sunlight hours
- Existing greenhouse operations / infrastructure in the area
- Existing value chains in place for fresh produce in winter season (processing and fresh market)

Weaknesses

- Power costs are just average in the region
- Production of food crops over winter is uncommon currently
- Possibly need for additional infrastructure (e.g. lights) for existing greenhouse producers

Opportunities

- Coalition of greenhouse producers (purchasing / selling power with buyers, negotiating power with Utilities)
- Grants for expansion
- Ability to keep staff on board year round to allow for continuity from season to season instead of laying off most of workforce seasonally
- Expand the notoriety of West Michigan as a year-round fruit and veg production region

Constraints

- Volume may be limited for single producer to sell to agricultural processor – may be limited to fresh market value chains, labor (seasonal)
- Negotiating energy costs may be difficult without collective and collaborative efforts

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V. Economic Profile of West Michigan Counties

This section profiles the agricultural processing industry, agricultural production, workforce, infrastructure, and the strengths, weaknesses, opportunities, and threats for the Five County region as a whole and each individual county in the study area. Data for these profiles comes from federal resources (USDA, Census Bureau), IMPLAN modeling, and stakeholder outreach.[1-4]

West Michigan Five County Area

Agricultural Processing Industry

68+	$2.82B	5,430
agricultural processing establishments	in annual sales of processed agricultural goods	jobs in the agricultural processing industry

West Michigan's agricultural processing industry is strongest in:

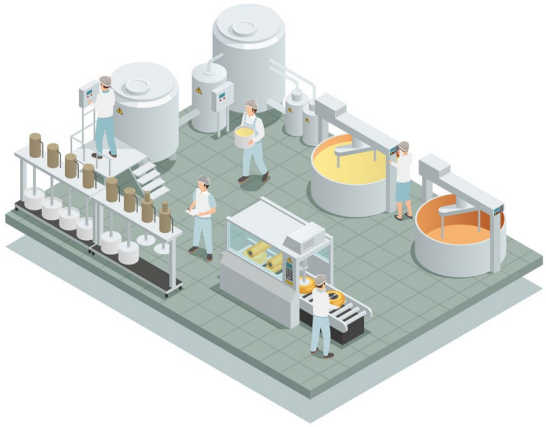
- Frozen Fruits, Juices and Vegetables manufacturing
- Canned Specialties
- Canned Fruits and Vegetables Manufacturing
- Dairy Products Manufacturing
- Bread and Bakery Products
- Sawmills
- Wood Products Manufacturing

Economic Impacts of the Agricultural Processing Industry

$452M	8,839	$166M
in labor income	jobs supported	in tax revenue

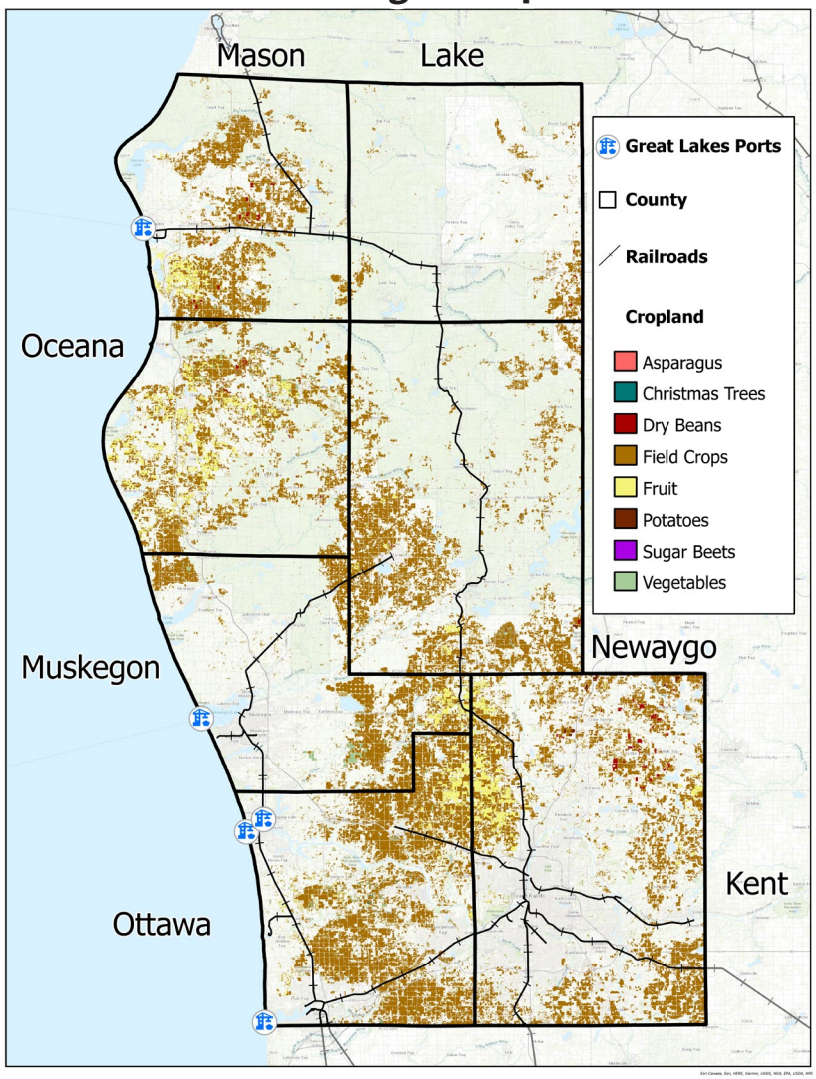
Notable Agricultural Processing Companies:

- Gerber Products Company
- Peterson Farms
- Burnette Foods, Inc.
- Seneca Foods
- House of Flavors
- Indian Summer Cooperative
- Hazekamp's Premier Foods
- Riveridge Cider



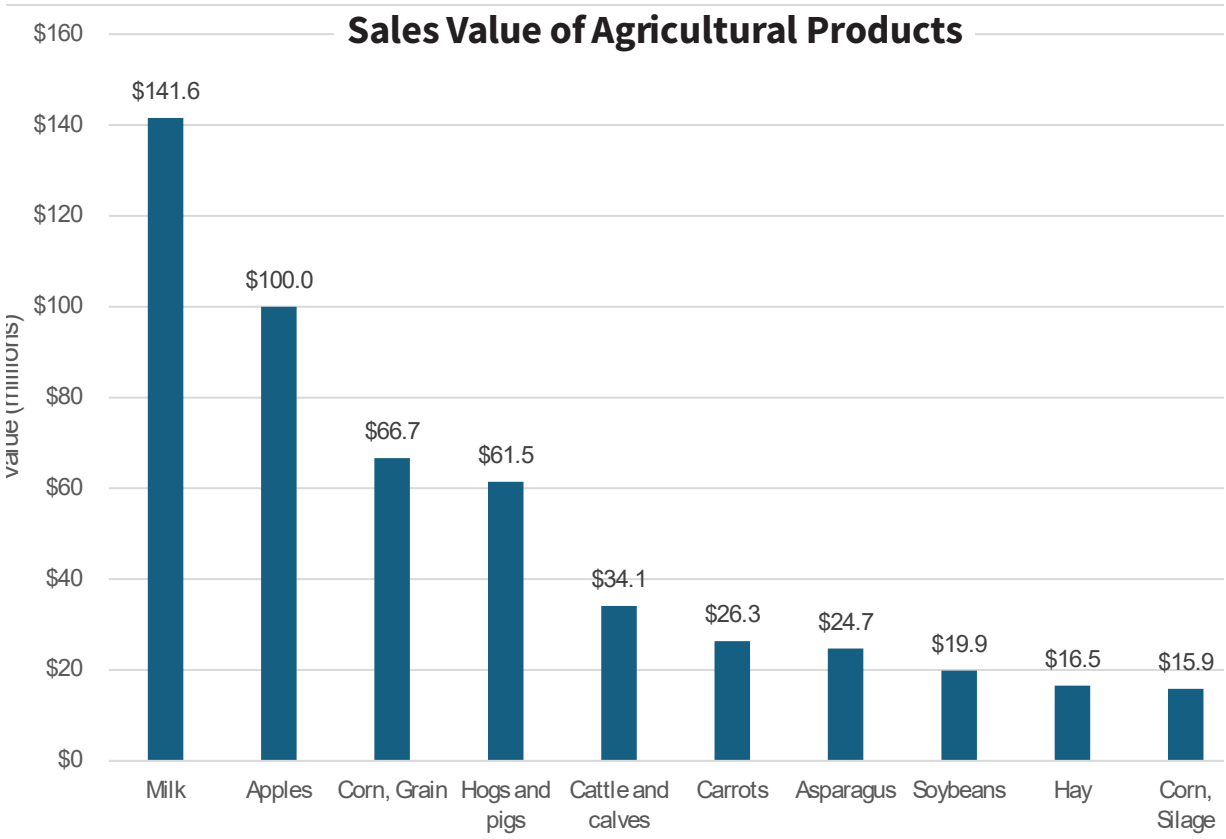
Agricultural Production

West Michigan Cropland



Notable Agricultural Products:

Product	Quantity	Farm Sales Value
Milk	N/A	$142 mil
Apples	9,806 acres	$100 mil
Corn, Grain	64,897 acres	$67 mil
Hogs and Pigs	70,747 head	$61 mil



Personal Income from Farming:	Number of Farmers:	Jobs in Forestry and Logging:
$205M	4,049	17

Workforce Population

The five-county study area has a lower labor force participation rate than Michigan (61%) and an equally low employment rate (4%), both of which would make it more difficult for employers to find workers. Because the population with some college education is also lower than the state (63%), employers may find it harder to find workers with the necessary skills.

Working Age Population (18-65):

171,300

Labor Force Participation Rate:

57%

Unemployment Rate:

4%

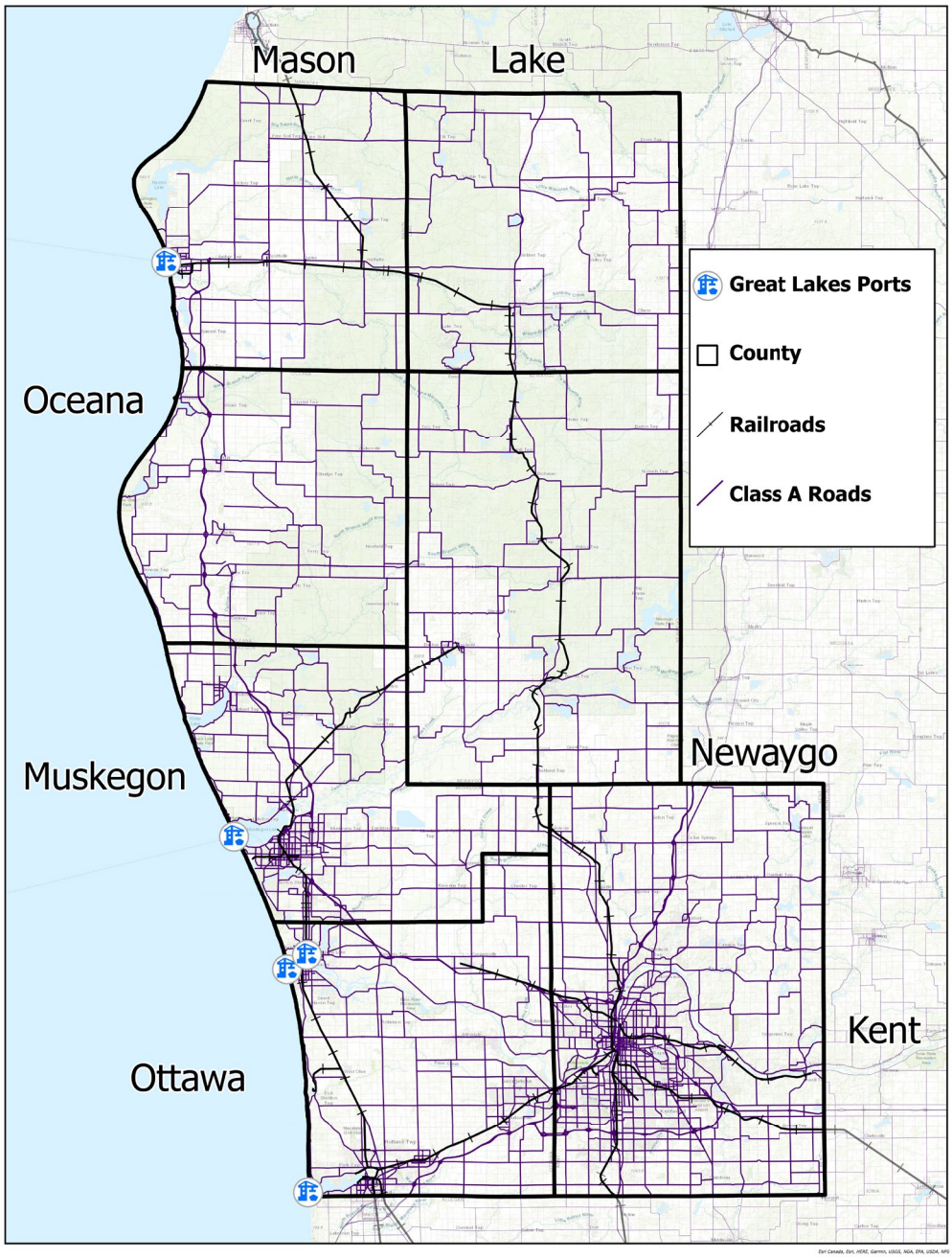
Population with Some College Education:

54%

Interviews and survey results indicate that both agricultural producers and processors struggle to fill some positions in West Michigan. Skill sets that are in short supply include journeyman meat cutters, food processing workers, maintenance (trade work), and long-haul truck drivers.

Infrastructure and Resources

West Michigan Transportation Networks



The study area generally has good transportation networks, with one-day access to major markets (Chicago, Detroit, Milwaukee, Indianapolis, and Cleveland, as well as London, Hamilton, and Toronto in Ontario, Canada). The network allows for effective transport of perishable goods such as fresh produce. The rail network in the region is generally good, although this has less of an influence on the agricultural processing industry than trucking. The area's two ports (Ludington and Muskegon) could theoretically be used to facilitate transport of agricultural raw materials and processed products, but would require both regulatory changes and investment.

SWOT Analysis

A SWOT analysis summarizes the **S**trengths, **W**eaknesses, **O**pportunities, and **T**hreats to economic development.

Strengths

- Strong agricultural production
- Strong processing sectors
- Availability of fresh water
- Favorable climatic conditions
- High quality of life

Weaknesses

- Worker availability
- Worker skills and education
- Governance structures
- Wastewater regulations

Opportunities

- Import substitution
- Capture value-added exports
- Agritourism
- Climatic advantage

Threats/Challenges

- Weather and climate
- Labor availability and cost
- Lack of affordable housing and childcare
- Wastewater capacity (in some areas)

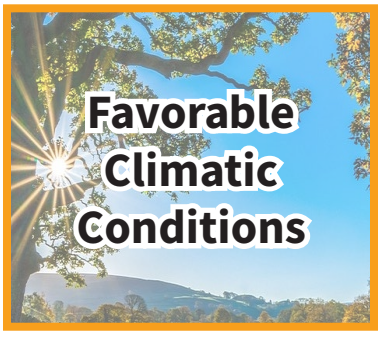
Strengths

Michigan is second only to California in the diversity of its agricultural products, and West Michigan is a primary contributor to that diversity. The region is a leading producer of fruits, vegetables, dairy, livestock, row crops, and floriculture and nursery products.

West Michigan has an outsized agricultural processing sector that hosts multiple regional and national brands. Leading processing sectors include fluid milk and other dairy products, fruit and vegetable canning/freezing, pickling and fermentation, and specialty processing (sauces, baby food, and frozen goods).

One asset that distinguishes West Michigan from other growing regions in the country (particularly in the West) is the availability of fresh water. Its proximity to Lake Michigan offers both agricultural producers and processors with fresh water that will become even more valuable under climate change.

Lake Michigan's moderating influence on the region's climate provides advantages for agricultural production, including delayed spring warming, extended fall warmth, winter snow cover (protecting root crops), humidity regulation, and the creation of microclimates that support high crop diversity.



Weaknesses

West Michigan has a relatively small population that experiences low labor force participation rates and low unemployment rates. These factors combine to create a small labor pool, which leaves both agricultural producers and processors struggling to find workers.

Processors in the region report having difficulty finding workers with the needed skillsets. Relatively low rates of higher education contribute to these shortages. Skillsets in short supply include tradework (electrical, plumbing, HVAC), commercial truck drivers, and production workers.

Overlapping levels of local government make it more difficult to gain approval for development. Michigan's township structure is unique in its scope and authority, and in the past has acted as a barrier to growing the agricultural processing industry in the area.

Agricultural processors in the region almost unanimously cite state-level (EGLE) wastewater regulations as an impediment to the industry. Overly stringent standards, vague and shifting requirements, and an overly long and expensive approval process have been common themes.

Opportunities

Processors in the region report importing agricultural products to support their operations, despite these products being produced locally. Examples include beef and hogs, blueberries, sweet cherries, and cucumbers. Replacing imports with local production would increase economic activity.

Many agricultural goods produced in West Michigan leave the area to be processed elsewhere. Examples include peaches, livestock, raw milk, grains, and asparagus. Processing more of these products in the local area would generate more local economic activity (jobs, income, taxes).

This increasingly popular business model adds value to agricultural production by combining sales of fresh and lightly-processed products with entertainment and education. The region already hosts a number of successful examples, attesting to its viability in West Michigan.

West Michigan could gain a production advantage for some agricultural products as climate change worsens growing conditions in other regions. Examples may include leafy greens (CA/AZ), hops and malting barley (WA/ND/MT), blueberries (southeast), and fluid milk (southwest).

Threats / Challenges

Climate change is expected to increase extreme weather events, which could endanger the area's agricultural production. It's possible the area could experience (at times) too much and too little water, excessively hot and cold temperatures, and increased pressure from pests and diseases.

The region's processing sector depends on an available and affordable supply of labor, both for growers and processors. However, cost and availability have been cited as issues in both industries. If labor continues to be expensive and in short supply, it will limit the region's ability to grow its agricultural production and processing.

There is a lack of affordable housing and childcare in the region, which exacerbates worker shortages. Without these resources, people are less likely to live and work in the area. The issue is serious enough that at least one large agricultural processor built housing and offered childcare for their workers.

While wastewater capacity is strength for some areas, it is in short supply in others. For example, processors in rural Oceana County must rely on their own wastewater treatment, the closure of the Fremont digester was a loss for Gerber Foods and others, and MCRRC is currently limited in its ability to accept fats, oils, and grease.

Lake County

Agricultural Processing Industry

>3	$23.4M	52
agricultural processing establishments	in annual sales of processed agricultural goods	jobs in the agricultural processing sector

Lake County has a smaller agricultural processing industry than other counties in West Michigan. Sectors present include:

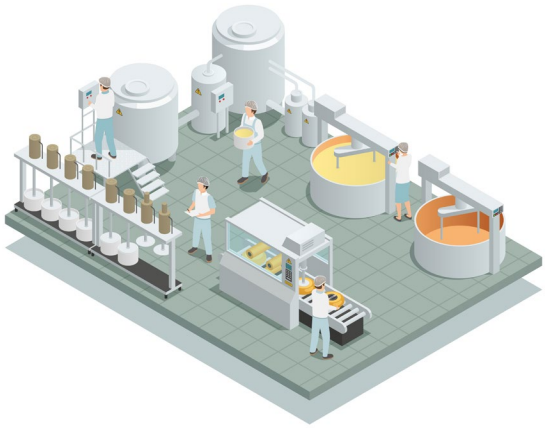
- Ice cream and frozen dessert manufacturing
- Sawmills

Economic Impacts of the Agricultural Processing Industry

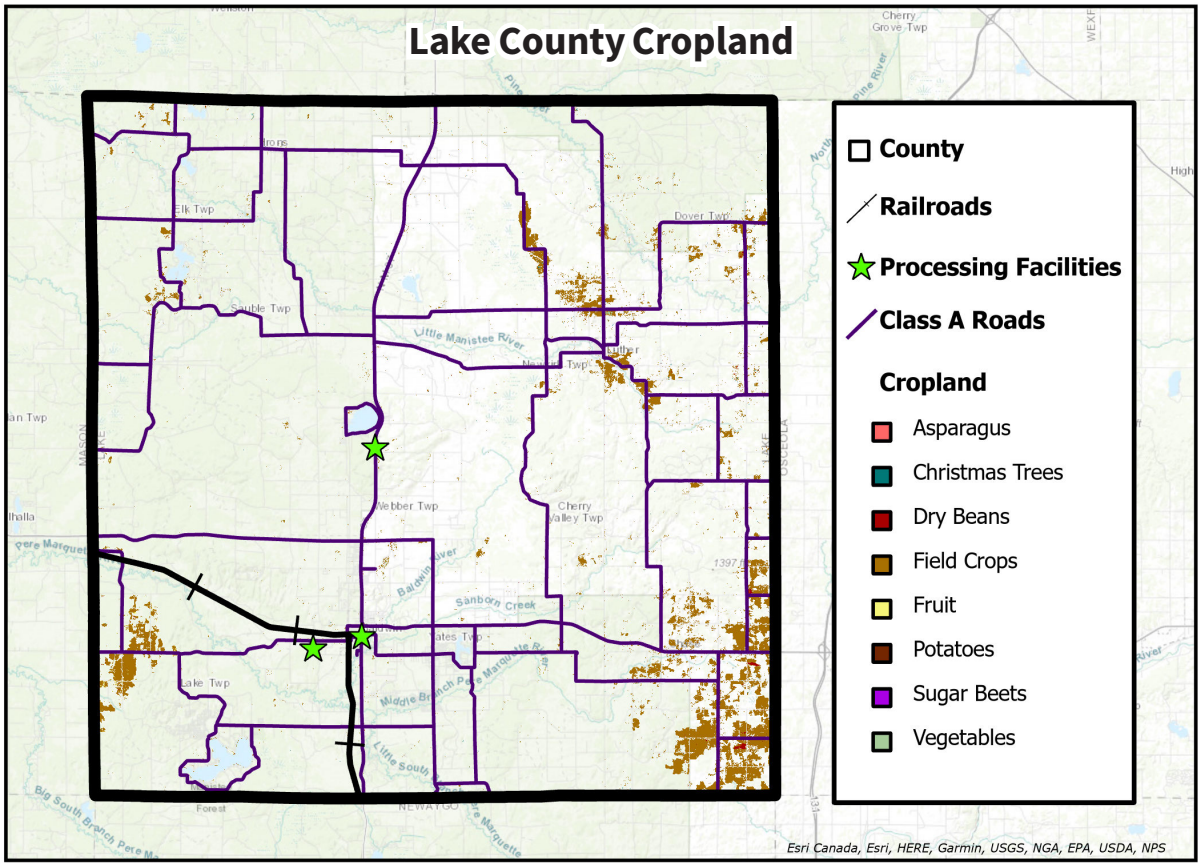
$5M	90	$1.67M
in labor income	jobs supported	in tax revenue

Notable Agricultural Processing Companies:

- Jones Homemade Ice Cream
- Jerome Miller Lumber Co.
- Wheeler's Wolf Lake Sawmill



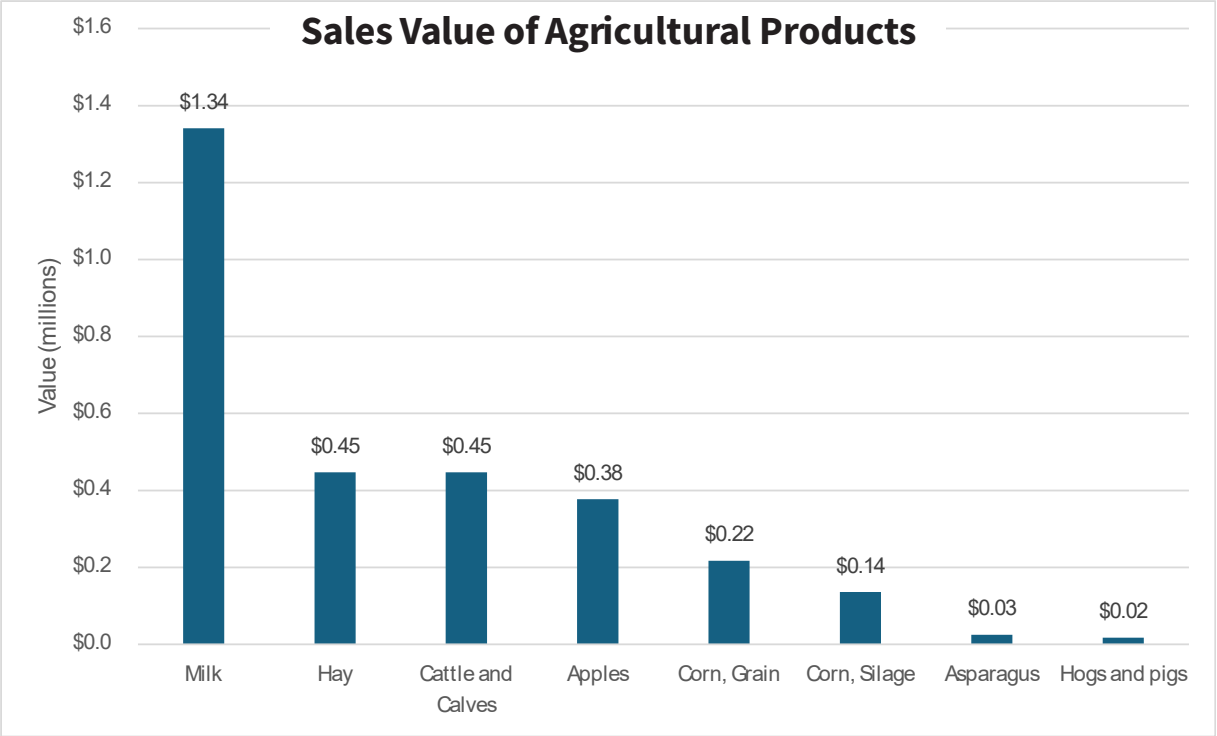
Agricultural Production



Cropland Acres:	Pastureland Acres:	Woodland Acres:
7,767	2,366	268,199

Notable Agricultural Products:

Product	Quantity	Farm Sales Value
Milk	N/A	$1.3 mil
Hay	4,209 acres	$0.5 mil
Cattle and Calves	1,114 head	$0.5 mil
Apples	37 acres	$0.4 mil



Personal Income from Farming:	Number of Farmers:	Jobs in Forestry and Logging:
$3.56M	257	18

Logging in Michigan; photo by Michigan DNR

Workforce Population

Lake County has a much lower labor force participation rate than Michigan (61%) and a slightly lower employment rate (4%), both of which would make it more difficult for employers to find workers. Because the higher education rate is also much lower than the state (63%), employers may find it harder to find workers with the necessary skills.

Working Age Population (18-65):

7,217

Labor Force Participation Rate:

43%

Unemployment Rate:

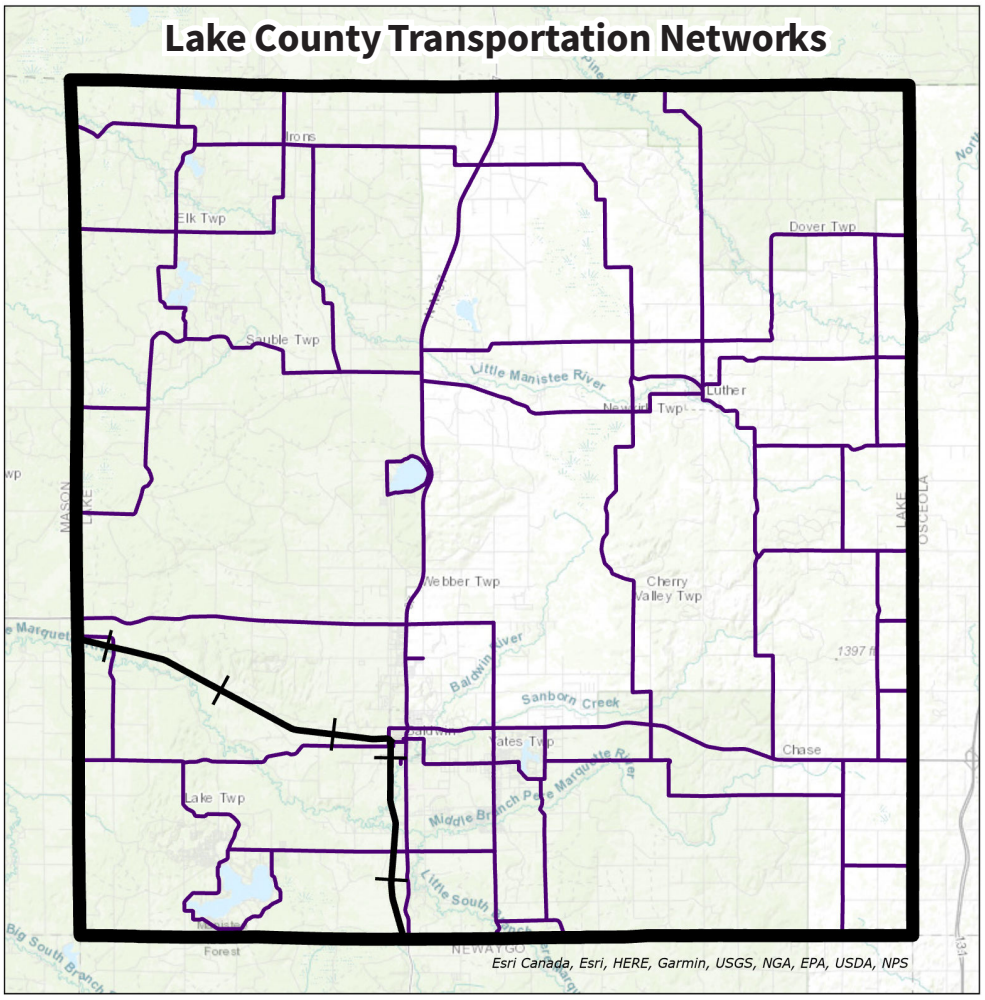
3%

Population with Some College Education:

41%

According to Lake County contacts, the county suffers from a lack of workers, which is exacerbated by a lack of interest in becoming employed. A shortage of housing and transportation options also limits the availability of workers in the county. Some employers (such as the Road Commission) are unable to fill job vacancies.

Infrastructure and Resources



Lake County has east/west highway access via Highway 10, which connect it to Mason County (to the west) and Osceola County (to the east). North/south highway access is available from Michigan 37, which connects Lake County to Wexford County (and eventually Traverse City) to the north and connects to Grand Rapids (passing through Newaygo County) to the south.

SWOT Analysis

Strengths

- Large areas of forest land
- Local and regional sawmills
- Affordable land

Weaknesses

- Low labor force participation and unemployment rate
- Low agricultural production
- Distance to markets, agricultural production, and other processing
- Cost of housing and childcare

Opportunities

- 60-acre site identified as a potential future industrial park
- Tariffs could increase softwood prices
- Hardwood manufacturing

Threats/Challenges

- Retaliatory tariffs could threaten timber exports
- A weak housing market could reduce demand for timber

Strengths

The county has over 268,000 acres of woodland, the second highest amount in the Five County Area.

Lake County hosts two existing sawmills. There are also more than 30 sawmills and wood product manufacturers in the surrounding counties.

Agricultural and in Lake County is the cheapest in the study area, and is 45% less expensive than the state average. This helps make agricultural production more economical.

Weaknesses

Lake County has the lowest rates of labor force participation and higher education in the study area. Combined with a low unemployment rate, this makes it difficult for employers to find workers with the necessary skills.

Lake County has the lowest level of agricultural production value in the study area. The lack of raw inputs make it less attractive as a place to grow the agricultural processing sector.

The county is far from large population centers. It takes more than one hour to drive between Baldwin and Grand Rapids. The distance to markets and other infrastructure would be a barrier to siting future processing facilities.

Lake County has the highest childcare costs in the study area, both in total and as a share of household income. It also has the highest percentage of homeowners that paying more than 30% of their income in housing costs. The lack of affordability makes it difficult for people to live and work in the area.

Opportunities

One 60-acre has been identified as a potential industrial park. Due to limited utility infrastructure, future facilities would need to be located close to Baldwin.

Recent tariffs increases on Canadian products entering the U.S. could decrease the supply of Canadian timber and increase the price of domestic timber. This could increase economic incentives to produce domestic timber (especially softwoods).

A recent economic development study identified furniture manufacturing as an industry with potential for growth in the county.

Threats / Challenges

Retaliatory tariffs from Canada on imports from the U.S. could decrease demand for U.S. timber products. Canada is one of Michigan's largest customers for finished wood products, and higher prices could decrease demand (especially for hard woods).

Timber demand is strongly influenced by newly-constructed housing. High mortgage interest rates and construction costs have dampened demand for new housing, which could act as a headwind for timber demand.

Mason County

Agricultural Processing Industry

13	$784M	1,264
agricultural processing establishments	in annual sales of processed agricultural goods	jobs in the agricultural processing industry

Mason County agricultural processing sector is strong in:

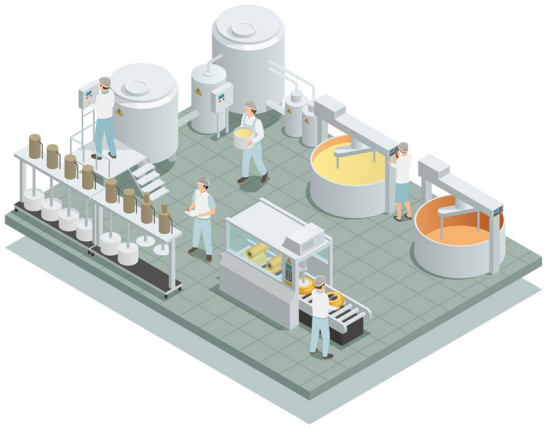
- Canned Fruits and Vegetables Manufacturing
- Canned Specialties Manufacturing (mushrooms)
- Dairy Products Manufacturing (cheese and ice cream)
- Animal Processing
- Condiment Manufacturing

Economic Impacts of the Agricultural Processing Industry

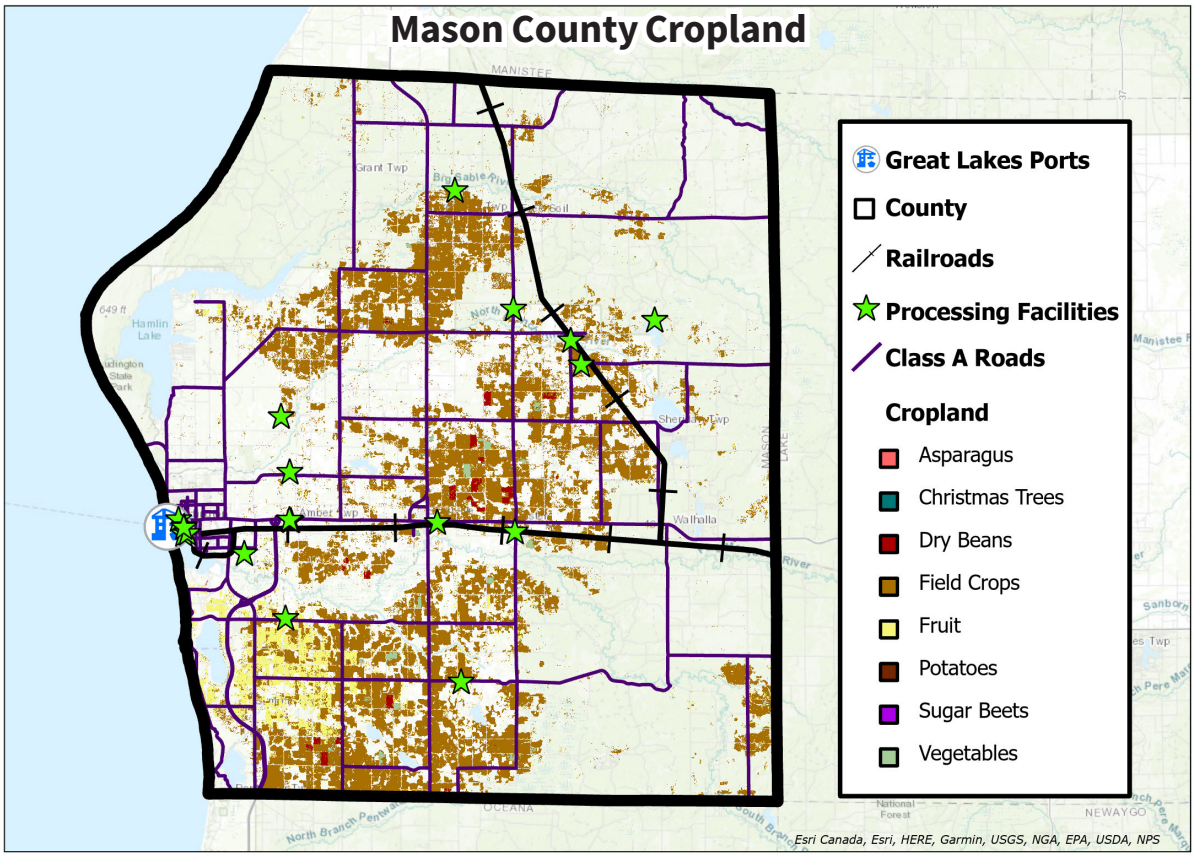
$105M	2,120	$36.7M
in labor income	jobs supported	in tax revenue

Notable Agricultural Processing Companies:

- Indian Summer Cooperative Inc.
- Mycopia (Gourmet Mushrooms)
- House of Flavors
- Michigan Farm Cheese (Andrulis Farmers Cheese)
- Sanders Meats
- Ludington Meat Company



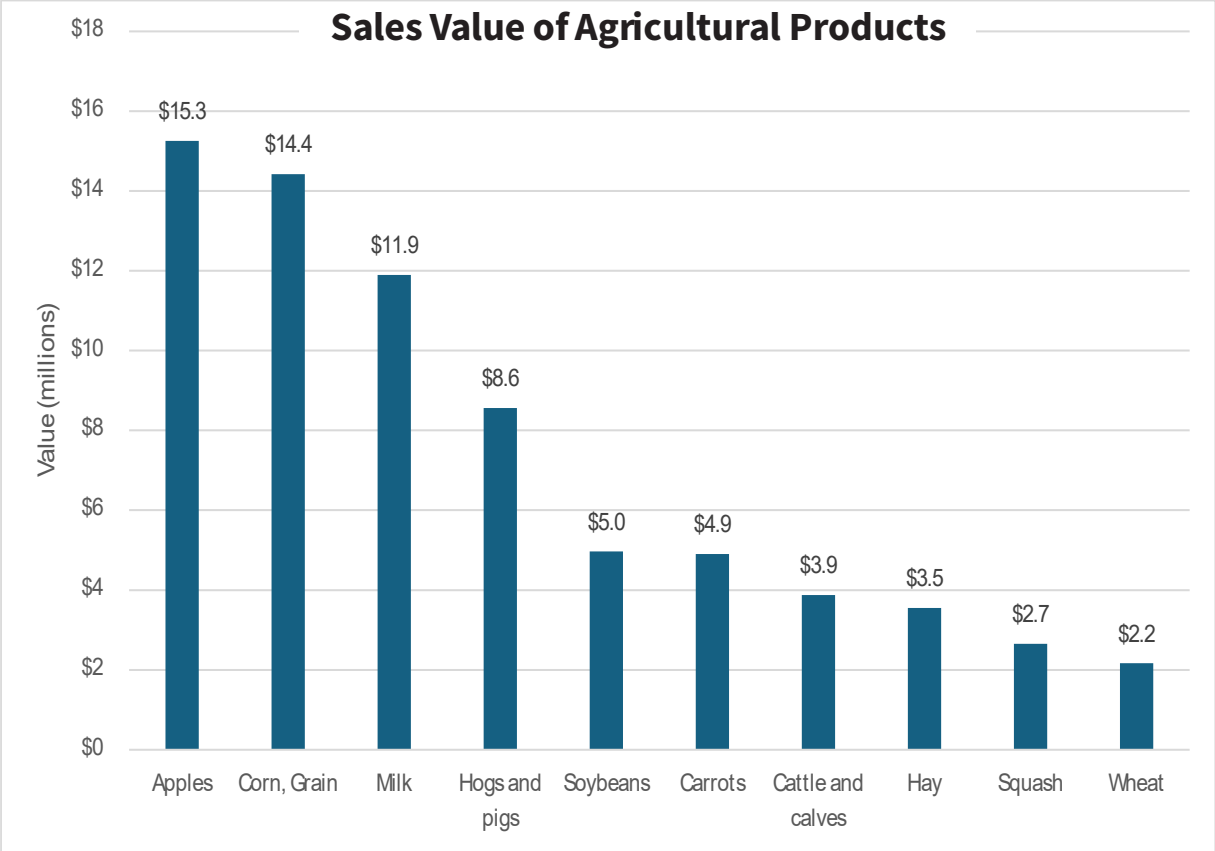
Agricultural Production



Cropland Acres:	Pastureland Acres:	Woodland Acres:
53,574	3,010	145,997

Notable Agricultural Products:

Product	Quantity	Farm Sales Value
Apples	1,496 acres	$15.2 mil
Corn, Grain	15,056 acres	$14.4 mil
Milk	N/A	$11.9 mil
Hogs & pigs	15,237 head	$8.6 mil



Personal Income from Farming:	Number of Farmers:	Jobs in Forestry and Logging:
$31.6M	731	3

Dairy cows at House of Flavors; photo by Highland Economics

Workforce Population

Mason County has a lower labor force participation rate than Michigan (61%) and a slightly lower employment rate (4%), both of which would make it more difficult for employers to find workers. Because the higher education rate is also slightly lower than the state (63%), employers may find it harder to find workers with the necessary skills.

Working Age Population (18-65):

15,901

Labor Force Participation Rate:

54%

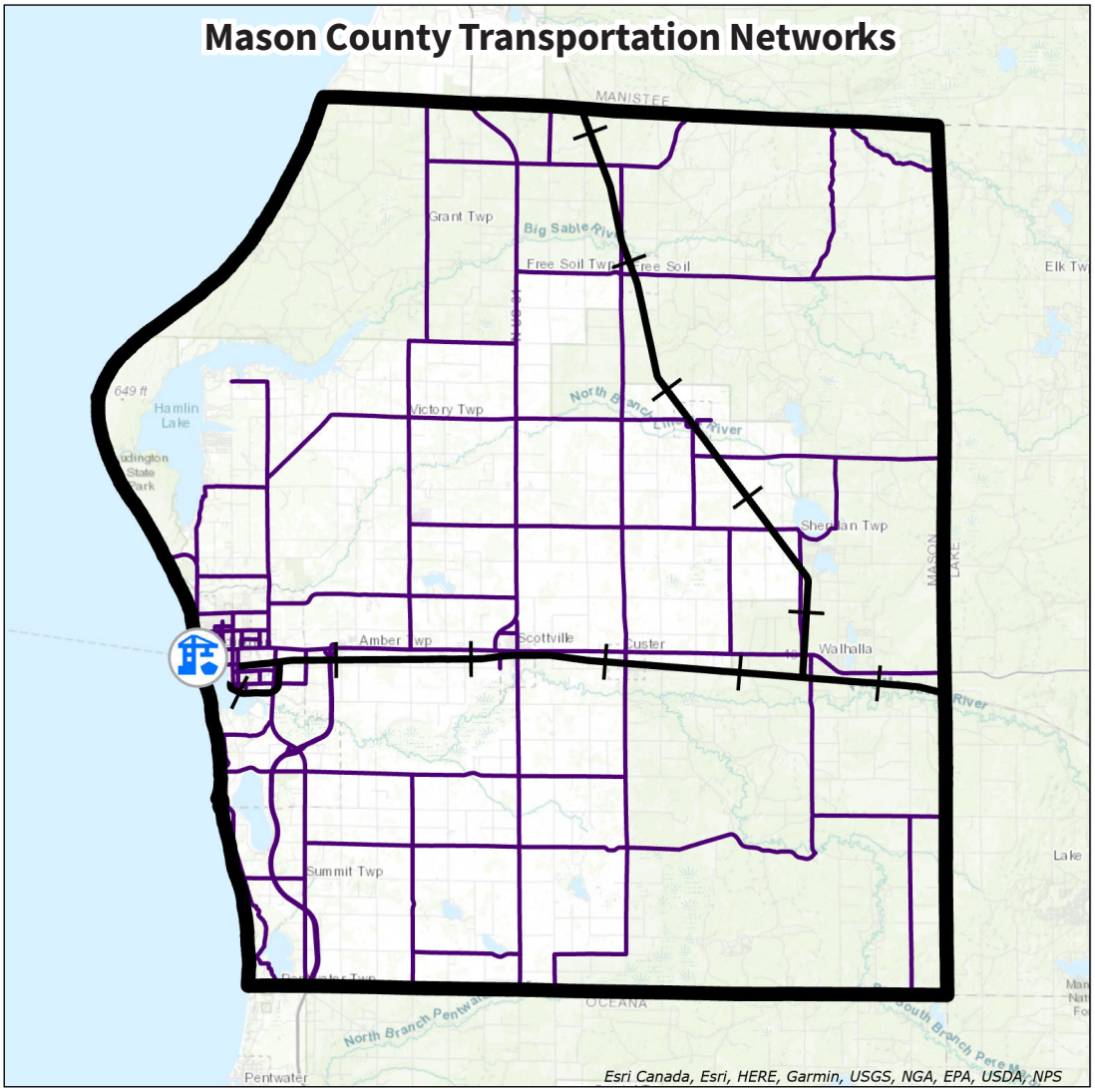
Unemployment Rate:

3%

Population with Some College Education:

59%

Respondents to our survey indicated that the existing workforce in Mason County is insufficient, and a lack of housing is a major hindrance to attracting workers. The County does host the West Shore Community College, which could offer a pathway for training skilled workers.



Mason County's main transportation artery is Hwy 31, which connects Ludington to the southwestern areas of the state. It also connects north to Manistee. Hwy 10 is the only highway running east-to-west. The county has a railroad line (Marquette Rail) that connects Ludington to Grand Rapids, as well as the Port of Ludington.

The Port of Ludington is limited in its ability to transport products and would require further development to accommodate large freight vessels. Direct rail-to-ship transfer infrastructure is also limited. The most notable current use of the port is the SS Badger, a ferry that transports cars and passengers to Manitowoc, Wisconsin.

SWOT Analysis

Strengths

- Strong existing agricultural processing sector
- Substantial raw inputs
- Great access to fresh water
- West Shore Community College

Weaknesses

- Low labor force participation rate makes it harder to find workers
- Low unemployment rate makes it harder to find workers
- Distance to urban centers
- Cost of childcare and housing

Opportunities

- Capture value-added processing
- Workforce training
- Import substitution

Threats/Challenges

- Wastewater regulations
- Shortage of truckers
- Cost and availability of agricultural labor

Strengths

Mason County hosts large food processors, including Indian Summer Cooperative, Mycopia, and House of Flavors. The presence of these companies proves the viability of agricultural processing in the area and makes future expansion in the industry more likely.

The county produces of a variety of valuable agricultural crops including apples, carrots, cherries, asparagus, as well as animal products. The diversity and abundance of these products provide the inputs needed to support a strong agricultural processing sector.

West Shore Community College currently offers programs on agricultural production and agribusiness. It also offers non-credit classes on food and beverage safety training and certification. Mason has the highest rate of higher education in the study area.

As a county that borders Lake Michigan, Mason has excellent access to abundant freshwater. Its county seat and largest city, Ludington, is located on the coast with its own harbor, providing convenient access to businesses in need of fresh water.

Weaknesses

A relatively small population, low unemployment, and low labor participation rates makes it more difficult for employers to find workers. Survey results suggest that the existing workforce is insufficient.

Mason County's distance to large cities (such as Grand Rapids, Detroit, and Chicago) makes it more difficult to procure inputs, hire workers, and transport products to markets.

Childcare in Mason County costs about 10% of household income (higher than Muskegon, Kent, and Ottawa counties). Survey responses have indicated that the area lacks affordable housing. Census data indicates that Mason housing is less affordable than other counties in the region.

Opportunities

Some of the most valuable agricultural products produced in the county are often exported for processing. These include apples, milk, cattle & calves, hogs & pigs, and carrots. There may be opportunity to process these products locally.

Currently, West Shore Community College does not offer courses on food processing. Doing so could enhance the workforce and make future processing more viable. Training long-haul truckers also fills an essential gap in the workforce.

A high inventory of livestock and ample fresh water makes Mason County a promising site for meat processing. Strong domestic and international demand for meat could drive growth in this sector. The county currently hosts two meat processors.

Threats / Challenges

A shortage of agricultural labor is a widespread concern for growers in the area. Stricter immigration enforcement may increase labor shortages. The cost of labor is a significant expense for many agricultural products, and has continued to rise in recent years.

Existing agricultural processors commonly cite state wastewater regulations (EGLE) as a prohibitive barrier to operations. The regulatory process is described as slow, vague, expensive, and capricious.

Stakeholders in the region have reported a shortage of skilled labor that impacts both processors and producers. These include truck and tractors drivers, skilled meat cutters, and tradesmen (plumbers, electricians, HVAC, etc.).

Muskegon County

Agricultural Processing Industry

30	$608M	1,377
agricultural processing establishments	in annual sales of processed agricultural goods	jobs in the agricultural processing industry

Muskegon County's agricultural processing sector is strong in:

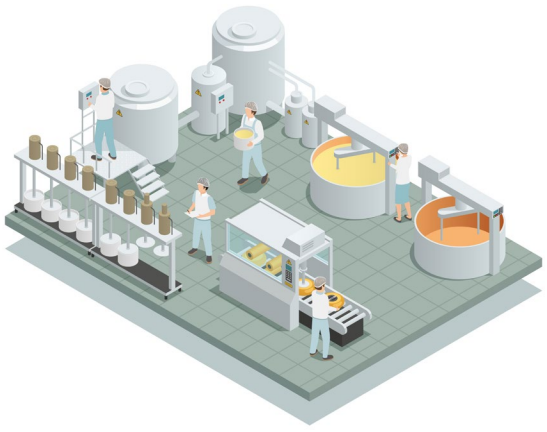
- Meat Processing
- Vegetable Canning
- Dairy Product Manufacturing
- Bread and Bakeries Products
- Beverage Manufacturing

Economic Impacts of the Agricultural Processing Industry

$177.5M	2,010	$50M
in labor income	jobs supported	in tax revenue

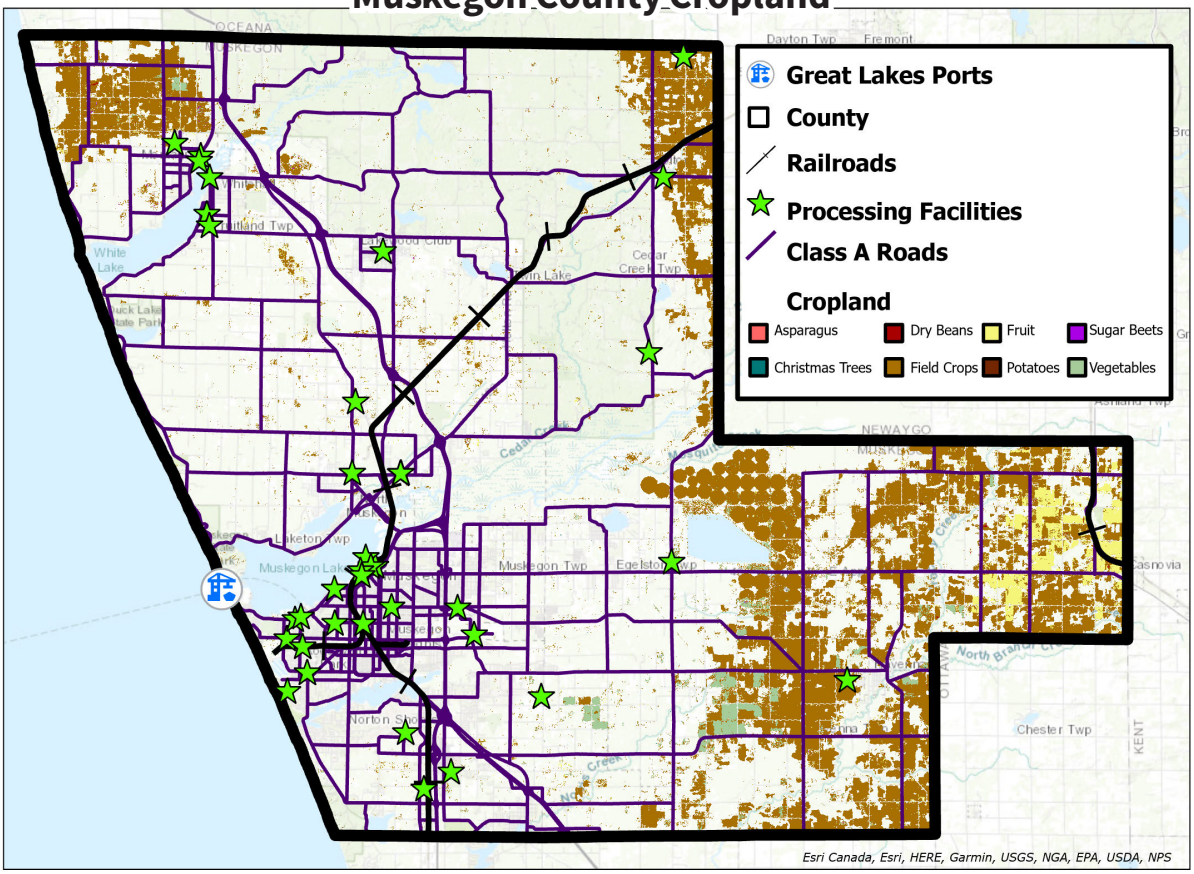
Notable Agricultural Processing Companies:

- Hazekamp's Premier Foods
- Swanson Pickle Company
- Hometown Creamery
- La Colombe



Agricultural Production

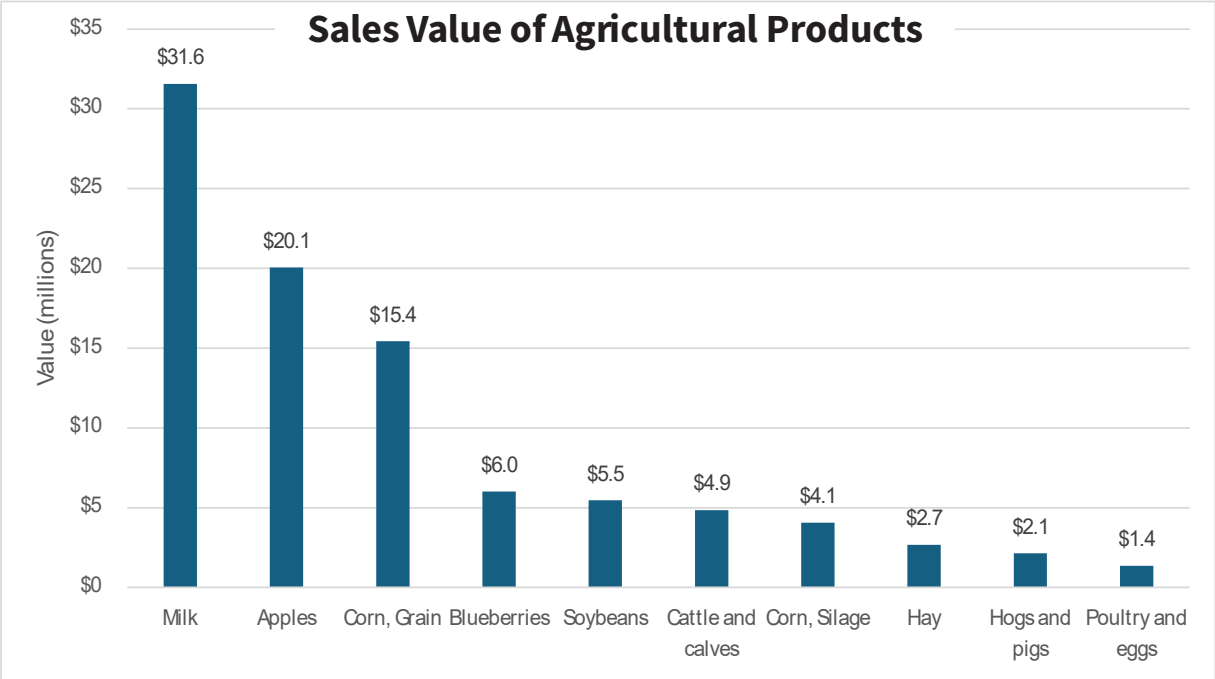
Muskegon County Cropland



Cropland Acres:	Pastureland Acres:	Woodland Acres:
47,071	5,091	142,244

Notable Agricultural Products:

Product	Acreage	Farm Sales Value
Milk	N/A	$31.6 mil
Apples	1,967 acres	$20.1 mil
Corn, Grain	12,066 acres	$15.4 mil
Blueberries	925 acres	$6.0 mil



Personal Income from Farming:	Number of Farmers:	Jobs in Forestry and Logging:
$33.7M	751	7

Swanson Pickle; photo by Highland Economics

Workforce Population

Muskegon County's high population provides employers with reliable access to workers. The labor force participation rate and unemployment rate are similar to the state as a whole. Because the higher education rate is lower than the state (63%), employers may find it harder to find workers with the necessary skills. However, the presence of Michigan State University and Muskegon Community College offer a source of support for workers, producers, and processors.

Working Age Population (18-65):

103,970

Labor Force Participation Rate:

59%

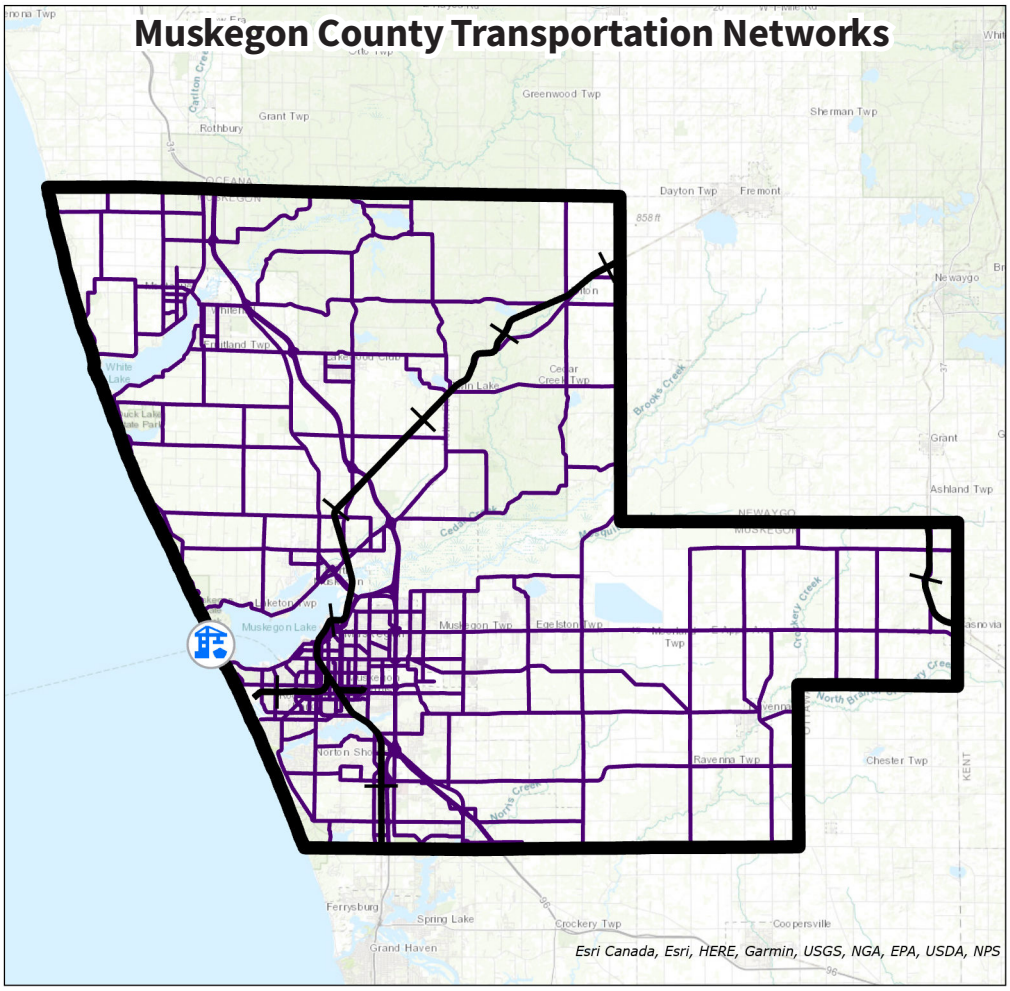
Unemployment Rate:

4%

Population with Some College Education:

56%

Infrastructure and Resources



Muskegon County has excellent transportation connectivity. Major highways connect it to agricultural production and processing areas to the north and south (Hwy 31) and to Grand Rapids in the east (I-96). The Mid-Michigan Railway connects Muskegon to Fremont (Newaygo County), Grand Haven (Ottawa County), and Grand Rapids (Kent County). The Port of Muskegon is the only natural deep port on Lake Michigan's eastern shore and could potentially be used to support agricultural processing.

SWOT Analysis

Strengths

- Advantageous location
- Strong transportation networks
- Higher education institutions
- Excess wastewater treatment capacity

Weaknesses

- Low rates of higher education
- Housing affordability
- Rates of violent crime

Opportunities

- Greenhouse crop production
- Educational programs
- Industrial sites available

Threats/Challenges

- Competition for workers
- Port limitations
- Loss of federal funding

Strengths

Muskegon County is centrally located between areas of agricultural production, large processors, and the Grand Rapids metro area. It has good access to Lake Michigan and to large markets in Detroit, Cleveland, Chicago, and Indianapolis.

A strong highway network connects the County to areas of agricultural production and to large markets. US-31 provides access to production areas in the north and south, and eventually connects to I-196 that connects to Chicago. I-96 connects to the Grand Rapids metro area and eventually Lansing and Detroit.

Muskegon hosts multiple centers for higher learning that can provide the skills and education needed to grow industries. These include Muskegon Community College, Baker College of Muskegon, Grand Valley State University, and MSU Extension.

The Muskegon County Resource Recovery Center has excess wastewater treatment capacity that could facilitate the expansion of agricultural process facilities. Currently, a pipeline is being constructed to connect existing facilities to the MCRRC.

Weaknesses

Muskegon's labor force participation rate is higher than the rest of the study area, but still lags behind neighboring Kent & Ottawa counties, as does its rate of higher education. This makes it more difficult for employers to find the workers they need.

The rates of residents burdened by the cost of housing (>30% of their income) is higher than neighboring counties for both renters and homeowners.

The rates of homicide and firearm fatalities in Muskegon County are higher than any of its neighboring counties (including Kent). This could make it a less desirable place to live and work.

Opportunities

The County hosts over 646,000 square feet of greenhouse production, much of which is underutilized in the fall and winter. As the Market Analysis discusses, this area could be used to produce fruit and vegetable crops in colder months.

The presence of higher education institutions offers the opportunity to train workers in the skills needed to support the agricultural processing industry. These institutions could help fill educational gaps in precision ag, food safety, meat and dairy processing, industrial refrigeration, and commercial drivers for perishable freight.

The West Michigan Shoreline Food Processing Initiative team identified more than 7 sites in the County that could be developed into food processing facilities. These sites range from 100,000 sq. ft. up to 40 acres.

Threats / Challenges

The Port of Muskegon is the only natural deep port on Lake Michigan's eastern shore and could potentially be used to support the agricultural processing industry by importing and exporting goods. However, significant regulatory and logistical barriers exist to making this possible.

Processors in the region commonly cite worker retention as a challenge. The concentration of employers in the Muskegon metro area makes it easier for workers to leave a job when more desirable employment becomes available. This can contribute to retention problems.

Recently, federal funding was cut to the Regional Food Business Centers program, which reduce support to small-scale food processors: less early-stage capital for equipment and compliance, technical assistance, and coordination and networking.

Newaygo County

Agricultural Processing Industry

9	$563M	837
agricultural processing establishments	in annual sales of processed agricultural goods	jobs in the agricultural processing sector

Newaygo County's agricultural processing sector is strong in:

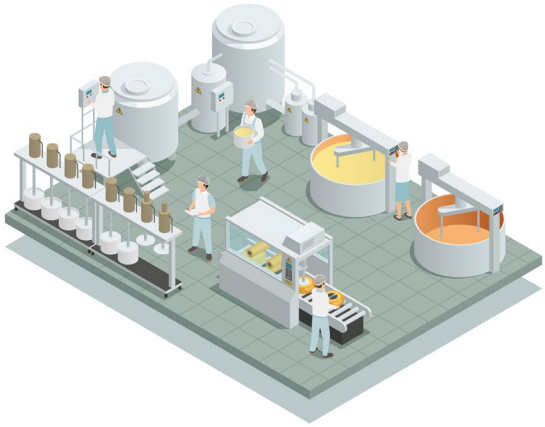
- Animal Food Manufacturing
- Canned Specialties Manufacturing
- Ice Cream Manufacturing
- Beverage Manufacturing
- Wood Products Manufacturing

Economic Impacts of the Agricultural Processing Industry

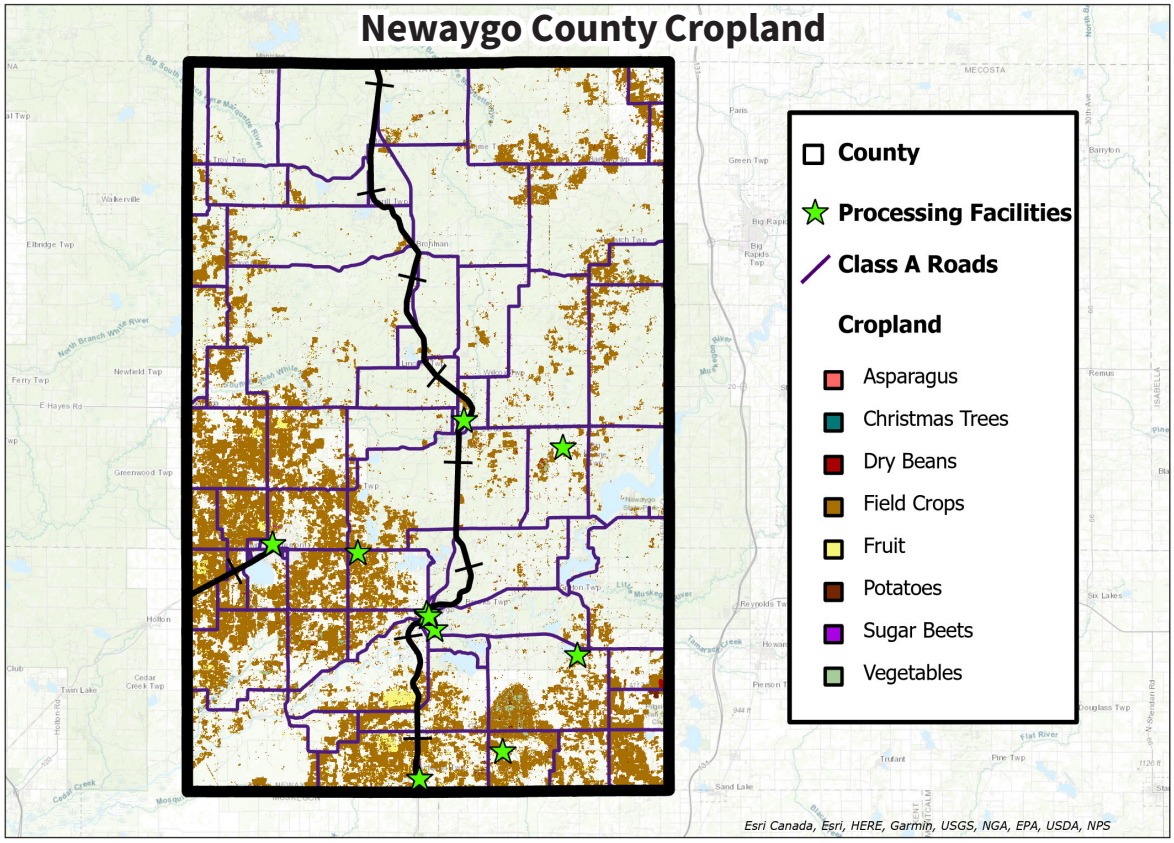
$70M	1,530	$22.3M
in labor income	jobs supported	in tax revenue

Notable Agricultural Processing Companies:

- Gerber Products Company (Nestle)
- Riveridge Cider Company
- Keystone Cooperative
- GM Wood Products
- Newaygo Brewing Company



Agricultural Production



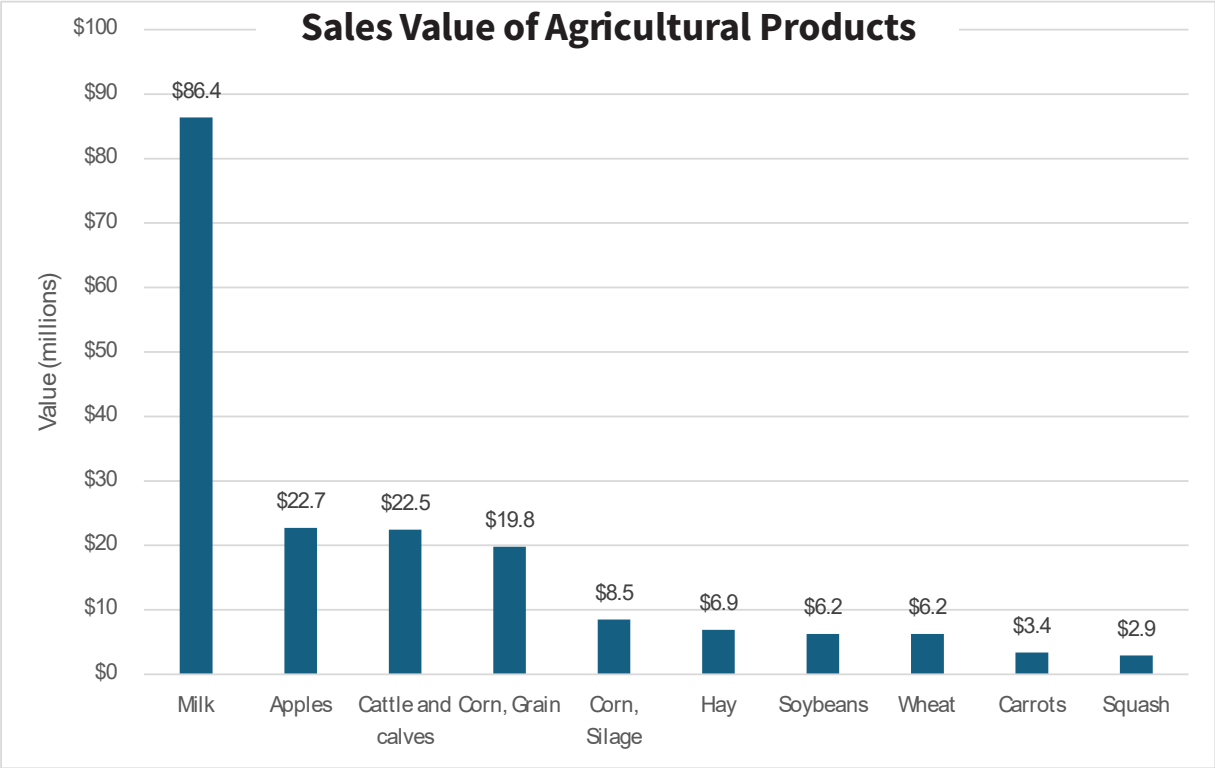
CROPLAND ACRES: **80,534**

PASTURELAND ACRES: **10,064**

WOODLAND ACRES: **290,487**

Notable Agricultural Products:

Product	Quantity	Farm Sales Value
Milk	N/A	$86.4 mil
Apples	2,225 acres	$22.7 mil
Cattle & Calves	34,607 head	$22.5 mil
Corn, Grain	19,478 acres	$19.8 mil



Personal Income from Farming:	Number of Farmers:	Jobs in Forestry and Logging:
$82.7M	1,406	5

Fremont Marketplace; photo by Highland Economics

Workforce Population

Newaygo County has a lower labor force participation rate than Michigan (61%) and a lower employment rate (4%), both of which would make it more difficult for employers to find workers. Because the higher education rate is also much lower than the state (63%), employers may find it harder to find workers with the necessary skills.

Working Age Population (18-65):

29,069

Labor Force Participation Rate:

56%

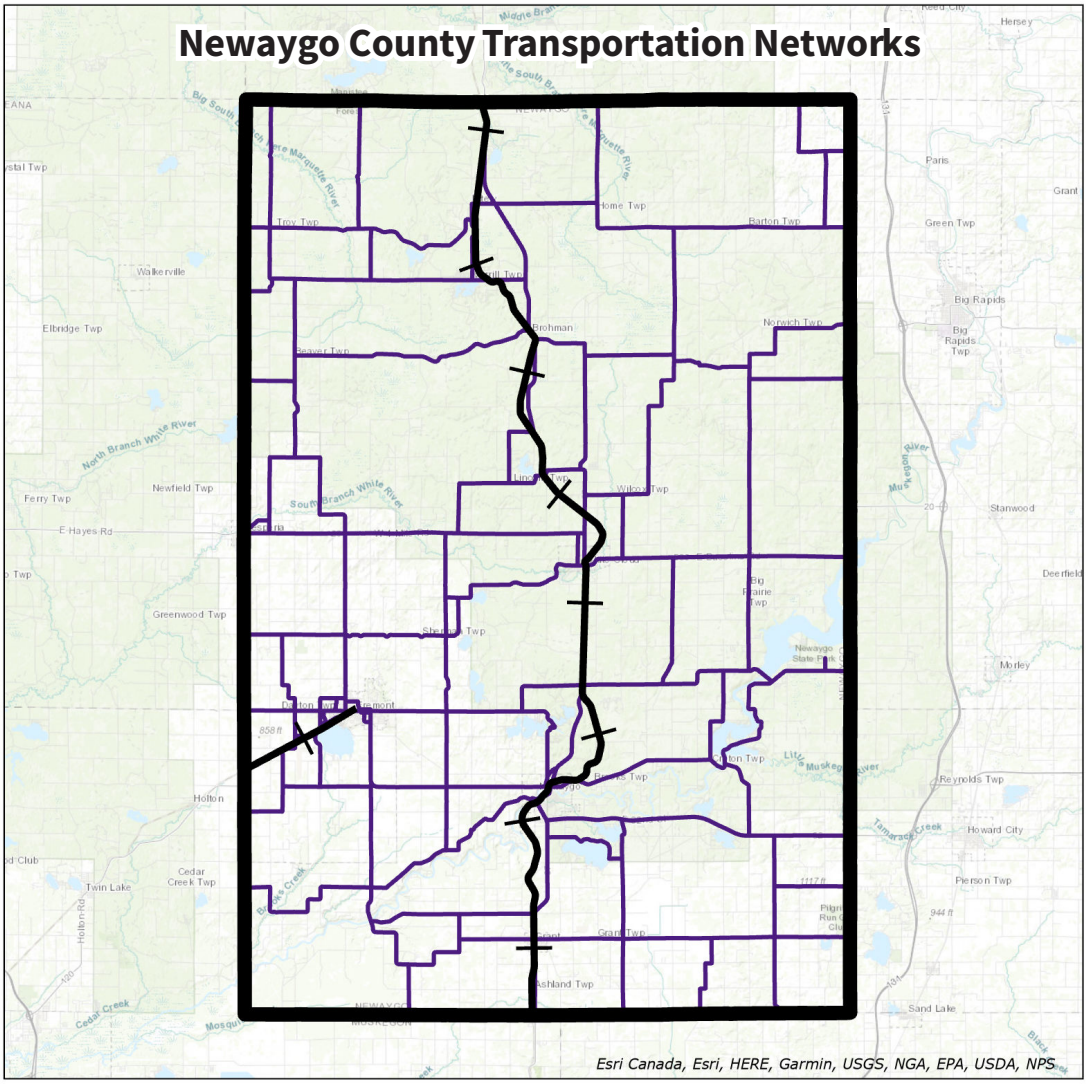
Unemployment Rate:

3%

Population with Some College Education:

49%

Past surveys of agricultural businesses indicated a need for greater education and training in agricultural technology, food safety, equipment maintenance, and management. More recently, employers have cited challenges in hiring employees with the requisite skills and retaining employees.



Newaygo County has good transportation network to support processing. Class A roads (purple in the map above) connect the main population centers of Fremont, Newaygo, and White Cloud to the larger cities of Muskegon and Grand Rapids and to high-production areas in Oceana County to the west. The Marquette Railroad runs north to Baldwin and on to Ludington, as well as south to Grand Rapids.

SWOT Analysis

STRENGTHS

- Production of agricultural inputs
- Agriculture-related educational programs
- Joint planning agreement

WEAKNESSES

- Low labor force participation rate makes it harder to find workers
- Low rates of college education
- Industrial park is off transportation corridors
- Housing availability

OPPORTUNITIES

- Existing industrial park space
- Wastewater capacity
- New housing developments

THREATS/CHALLENGES

- Digester withdrew permit application
- Lack of refrigerated storage
- State-level wastewater regulations

Strengths

Newaygo is strong producer of raw agricultural goods that go into processing value-added products: Apples, milk, cattle and calves, and carrots. It also has the largest number of forested acres in the study area.

The Newaygo County Regional Educational Service Agency's (NCRESA)Career Tech AgriScience program offers high school students the opportunity to gain an education in agricultural science fields while also earning college credits. The program helps students prepare for careers in animal health & production, food science and safety, and plant science and soils.

Fremont's Joint Planning Commission have allowed local governments to streamline developmental planning and avoid the gridlock that is common among local governments in the region. Revenue-sharing 425 agreements have been successful in getting stakeholder buy-in.

Weaknesses

Newaygo County has a relatively small population, low unemployment rate, and low labor force participation rate. Rates of higher education are also low. These factors make it more difficult for employers to obtain workers and find those with the needed skills.

Local officials have stated that the City of Fremont suffers from a lack of housing, which makes it difficult for workers to live in the area for nearby processors (such as Gerber Foods) to hire employees.

Fremont's industrial park is a 20-25 minute drive away from the major transportation networks of US-31 and US-131. The park is also limited to "light manufacturing". These factors may dissuade some agricultural processors from developing facilities in the park.

Opportunities

Fremont's industrial park has 50 acres available for future development (of its total 100 acres). This area could be used to develop agricultural processing facilities or facilities that support the industry (such as cold storage). A future freezer warehouse project has recently been announced that is a possibility for the park.

The Fremont digester is designed to process up to 100,000 gallons of wastewater per day and generate up to 29 megawatts of power, and it has room to expand. When it was operational, it took in waste from various sources including Gerber Products. Restarting the digester offers the opportunity to increase wastewater capacity.

The City of Fremont recently approved two projects that will build 27 single-family housing units. It also sold land that will lead to the development of about 10 more units. Another project beginning in 2025 is planned to establish 120 units in a mobile home park.

Threats / Challenges

The Fremont digester closed in 2023 primarily due to its inability to comply with state-level wastewater regulations. An application was submitted that could have allowed the digester to resume operations, but the owners withdrew that application in March of 2025.

There is a shortage of refrigerated storage capacity in the area due to recent surges in demand. This makes it more difficult for agricultural producers and processors to maintain and expand their operations given the risk of losing their products to perishability.

Agricultural processors in the area commonly cite state (EGLE) wastewater regulations as a barrier to current operations and future expansion. The Fremont digester is one local example of this challenge, and it is likely to restrain other developments in the area.

Oceana County

Agricultural Processing Industry

>11	$837M	1,906
agricultural processing establishments	in annual sales of processed agricultural goods	jobs in the agricultural processing sector

Oceana County has a strong agricultural processing sector, especially in:

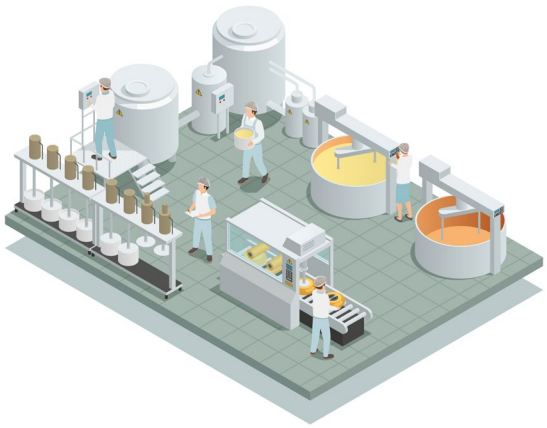
- Frozen Fruits, Juices, and Vegetables Manufacturing
- Fruit and Vegetable Preserving and Specialty Food Manufacturing
- Frozen Specialties Manufacturing
- Fluid Milk Manufacturing
- Animal Processing

Economic Impacts of the Agricultural Processing Industry

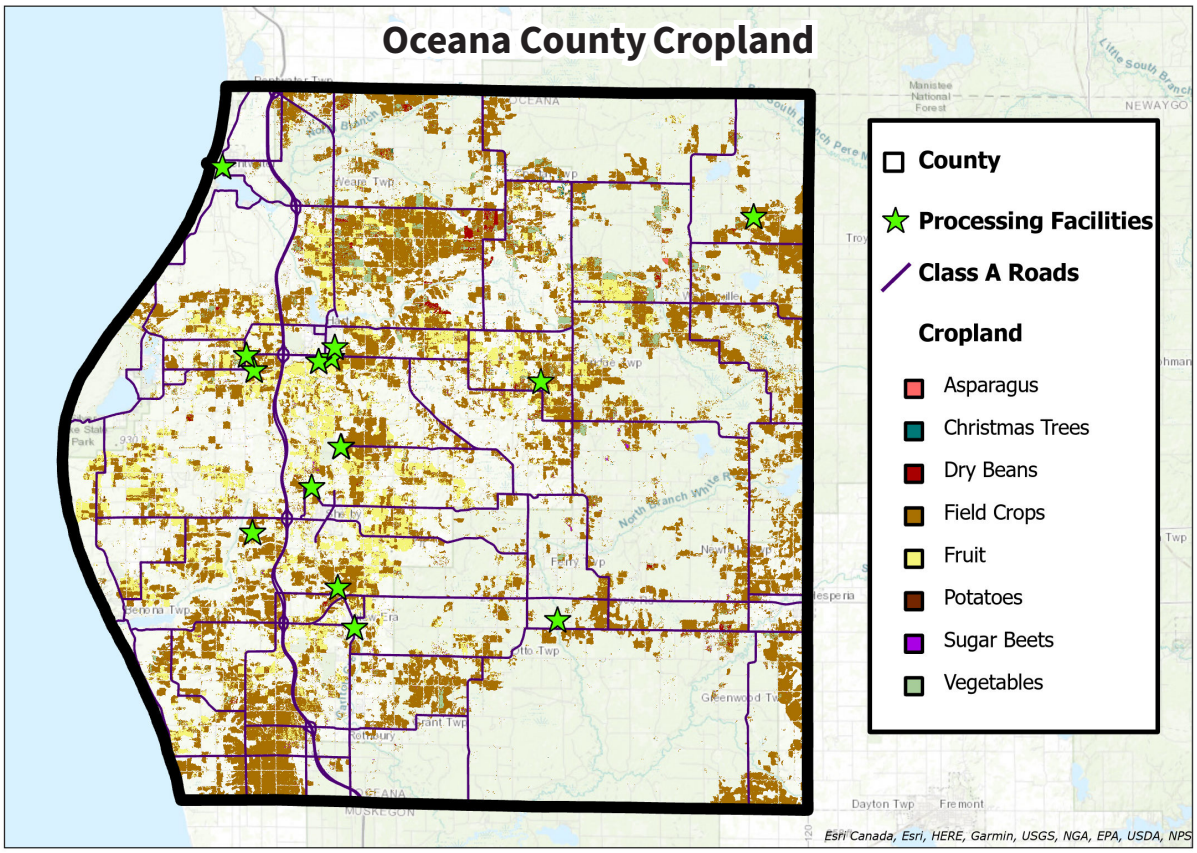
$156M	3,080	$55.5M
in labor income	jobs supported	in tax revenue

Notable Agricultural Processing Companies:

- Burnette Foods
- Seneca Foods
- Peterson Farms, Inc.
- Arbre Farms (Oregon Potato Company)
- Michigan Freeze Pack Co.
- Perdue Farms
- Country Dairy



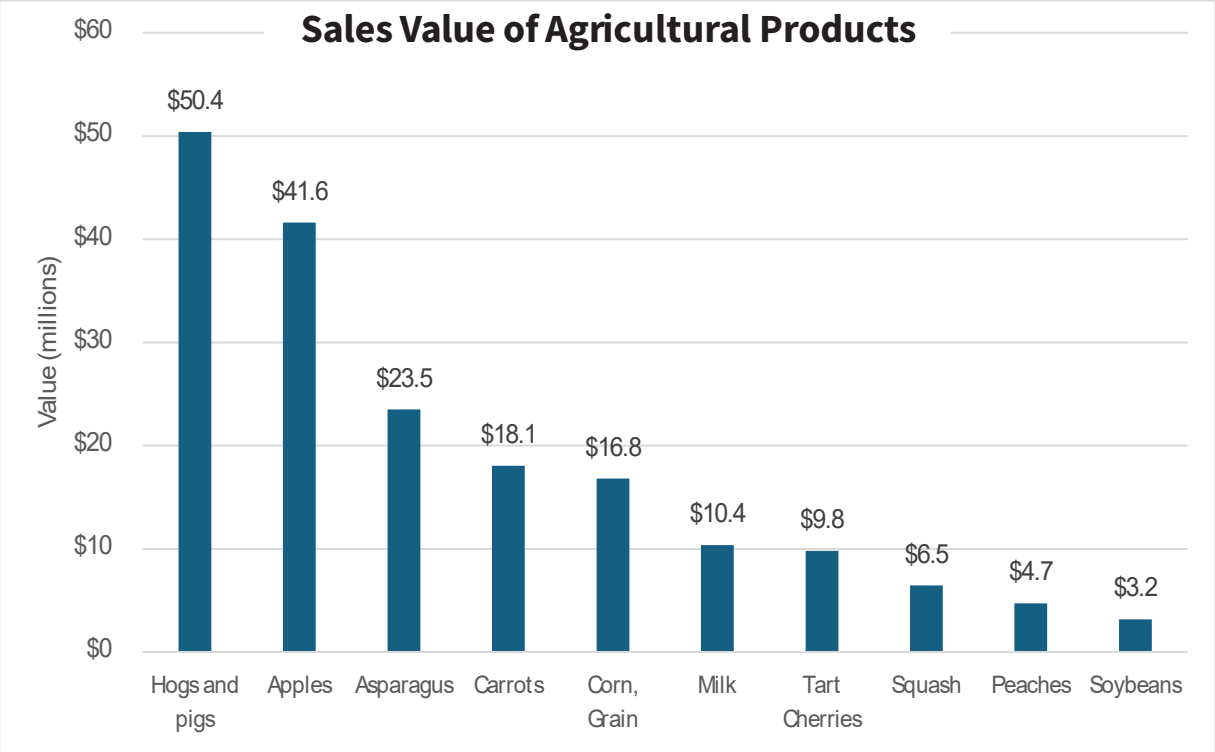
Agricultural Production



Cropland Acres:	Pastureland Acres:	Woodland Acres:
77,975	6,127	155,642

Notable Agricultural Products:

Product	Quantity	Farm Sales Value
Hogs & pigs	7,452 head	$50.4 mil
Apples	4,081 acres	$41.6 mil
Asparagus	7,452 acres	$23.5 mil
Carrots	1,038 acres	$18.1 mil



Personal Income from Farming:	Number of Farmers:	Jobs in Forestry and Logging:
$53.3M	904	1

Country Dairy Moo School; photo by Highland Economics

Workforce Population

Oceana County has a lower labor force participation rate than Michigan (61%) and a lower employment rate (4%), both of which would make it more difficult for employers to find workers. Because the higher education rate is also lower than the state (63%), employers may find it harder to find workers with the necessary skills.

Working Age Population (18-65):

15,143

Labor Force Participation Rate:

56%

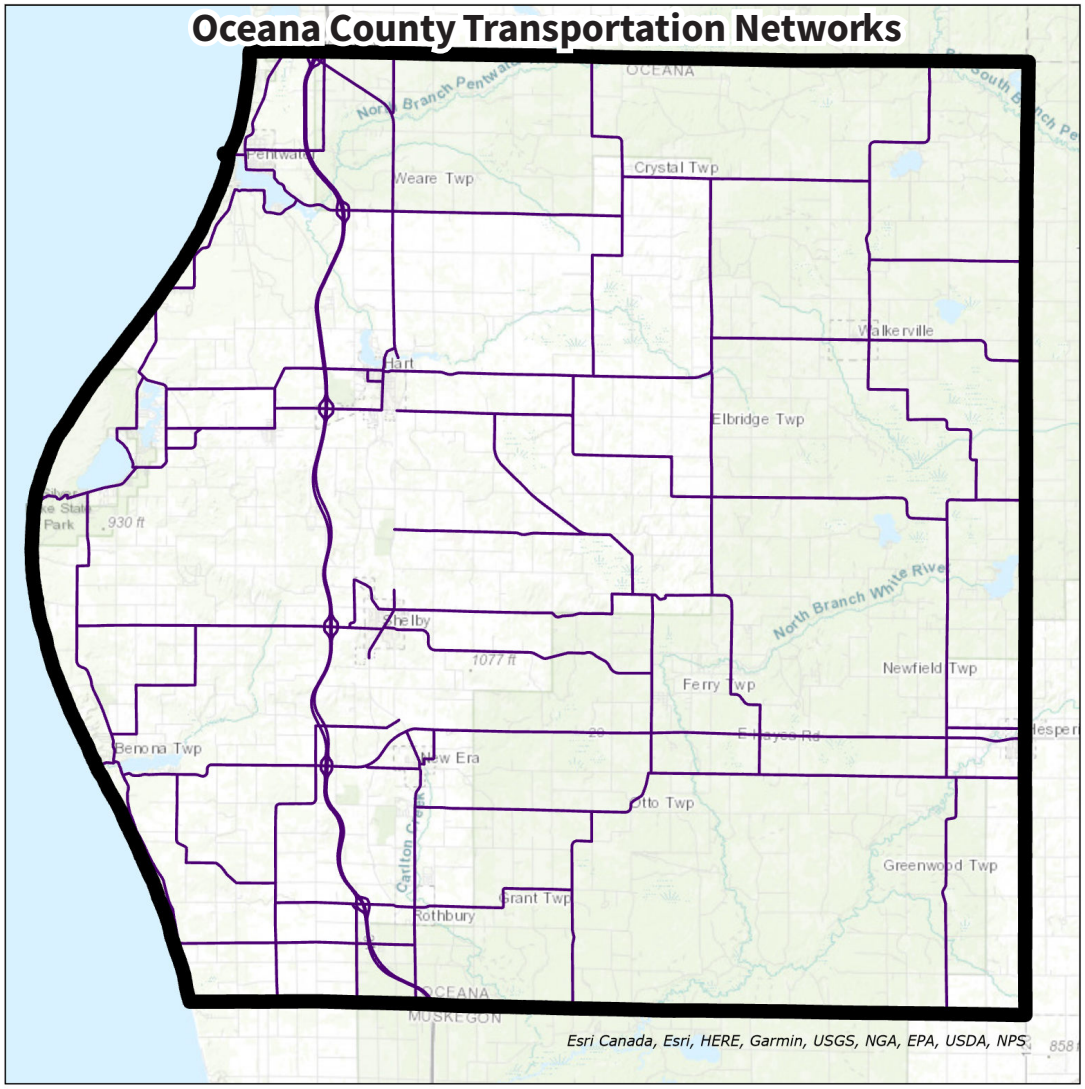
Unemployment Rate:

3%

Population with Some College Education:

51%

Respondents to our survey indicate that there are workforce issues in Oceana County, including a need for more agricultural workers with the requisite skill sets, and workers leaving the region for other jobs (two-thirds of Oceana workers commute to jobs in other areas, primarily to Kent and Muskegon Counties).



The West side of Oceana County offers convenient highway access north and south on Highway 31, which connects the county to Muskegon, Holland, the Grand Rapids area through I-96, and Chicago through I-196 and I-94.

SWOT Analysis

Strengths

- Extensive production of high value crops (asparagus, apples, cherries, and peaches)
- Large and growing food processing sector
- Starting Block food incubator
- Hart wastewater system

Weaknesses

- Low unemployment, labor force participation, and higher education rates
- Lack of wastewater outside Hart
- Lack of public transportation
- Lack of affordable housing

Opportunities

- Capture more value-added processing
- Agritourism
- Import substitution

Threats/Challenges

- Lack of producer power
- International competition
- Lack of warehousing and storage
- Cost and availability of labor

Strengths

Oceana is a leader in the production of high-value crops that serve as inputs to processing. These include asparagus, apples, cherries, and peaches. Oceana hosts 75% of the state's asparagus acreage and is known as the "Asparagus Capital of the World".

Oceana already has a strong food and beverage processing sector and includes large brand names. The existence of such a vibrant sector makes apparent the viability of agricultural processing in the county. This is further evidenced by the fact that Burnette Foods just completed a recent expansion of their facility.

The Starting Block is a business incubator that helps food businesses start and grow by providing production space, guidance, and education.

The City of Hart has a dedicated wastewater system that is targeted primarily toward food processing sectors.

Weaknesses

Low unemployment and labor participation rates can make it difficult for employers to find workers. Two-thirds of workers leave the county for their jobs, often going to Muskegon and Grand Rapids. Survey results suggest that workers lack the necessary skills to produce agricultural inputs.

While the wastewater system in Hart is conducive to food processing development, outside the city, food processors are largely responsible for managing their own wastewater systems, adding cost and complexity to development in this sector.

A lack of public transportation options makes it more difficult for low income workers to live and work in the area. This has resulted in one processor (Peterson Farms) to supply their own transportation for workers.

Oceana lacks a sufficient supply of affordable housing, making it more difficult to attract and retain workers. This has led at least one large processor (Peterson Farms) to build housing units for 250 employees.

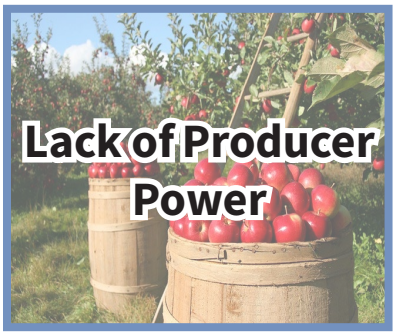
Opportunities

Some products produced in the local area are often exported for processing outside the region. These include peaches, animals for meat, milk, and asparagus. If these goods were processed locally, it would support economic activity in the form of jobs, income, and tax revenues.

Strong agricultural production and relatively close proximity to the urban centers of Muskegon and Grand Rapids make Oceana County a promising place for agritourism. The success of local examples such as the Lewis Adventure Farm & Zoo and the Country Dairy Farm Store attest to the viability of this industry in the area.

Local processors have had to import some agricultural products (including sweet cherries and blueberries) because they are not being grown in sufficient quantities locally. This indicates there may be an opportunity to expand agricultural production of these crops.

Threats / Challenges



In recent years, an oversupply of apples and cherries has allowed processors leverage over growers, leading to buying terms that favor processors at the expense of growers. This may convince some growers to find other buyers outside the local area or lead to producers switching crops.

Some Oceana respondents to our survey indicated that there is a need for more warehousing/storage space during the peak harvest season. This could limit the production of fruits and vegetables in the region.

In past years, foreign countries (such as Peru) have flooded the local market with cheap imported vegetables and fruits (including blueberries, asparagus, and cherries) in order to capture market share, which has squeezed out local suppliers.

Agricultural producers commonly mention the high cost of the H-2A program as a threat to their operations. The availability of migrant labor is also a concern. Because high-value crop production in Oceana County relies on this labor, this issue affects both producers and processors.

Economic Profiles References

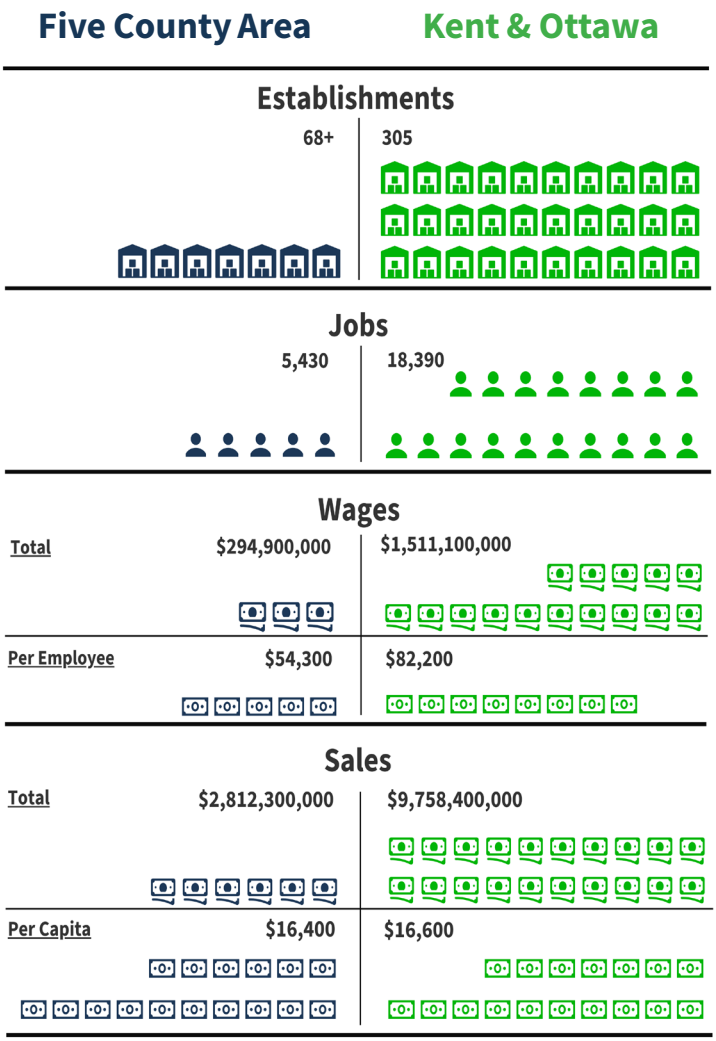
1. Highland Economics; IMPLAN Group LLC. (2023). IMPLAN model.
2. USDA NASS. (2025). Cropland Data Layer: USDA NASS, USDA Marketing and Information Services Office, Washington, D.C.
3. USDA NASS. (2025). Quickstats. Retrieved from https://quickstats.nass.usda.gov/
4. US Census Bureau. (2024). American Community Survey 5-Year Estimates. Washington, D.C.

VI. Comparative Analysis of the Five County Area Versus Kent & Ottawa Counties

The neighboring counties of Kent and Ottawa have strong agricultural production and processing sectors. Ottawa County is home to Heinz, Request Foods Inc., and Fairlife/Continental Dairy. Kent County contains the Grand Rapids metro area, which is home to over 200 food and beverage manufacturing establishments and well-known brand names such as SnackCraft, Kellogg's, Founders, and Coca-Cola. This comparative analysis examines the differences in the agricultural production and processing industries between the five-county study area and Kent and Ottawa counties and the factors that influence this industry.

Comparison of Agricultural Processing Sectors

Kent and Ottawa Counties have much larger agricultural processing sectors than the study area: more than four times the number of establishments, more than three times the number of employees, five times the total wages, and more than three times the annual sales.[1] Importantly, the wages per employee in Kent & Ottawa is about 34% higher than the study area, making it more likely to attract and retain workers in the industry. The five-county area has similar per capita sales than Kent & Ottawa, which indicates that the study area has a strong processing industry relative to its population.[1]



Kent and Ottawa counties out-produce the Five County Area in several areas: Cheese, soft drinks, bakery products, and meat.[2] However, when the relative population is considered (which is a more useful metric for evaluating the strength of a sector), the five-county area out-produces Kent and Ottawa Counties in almost every case.[2] This shows how the Five County Area has strong production relative to its neighbors.

	Total Sales		Sales Per-Capita	
	Five County Area	Kent & Ottawa	Five County Area	Kent & Ottawa
Frozen fruits, juices and vegetables manufacturing	$552,432,000	$36,410,000	$3,225	$62
Canned fruits and vegetables manufacturing	$394,555,000	$229,855,000	$2,303	$391
Canned specialties	$377,446,000	$238,473,000	$2,203	$406
Ice cream and frozen dessert manufacturing	$220,074,000	$12,357,000	$1,285	$21
Cheese manufacturing	$170,695,000	$263,910,000	$996	$449
Bottled and canned soft drinks and water	$161,143,000	$403,791,000	$941	$687
Paper mills	$111,268,000	$0	$650	$0
Mayonnaise, dressing, and sauce manufacturing	$103,721,000	$17,025,000	$605	$29
Bread and bakery product, except frozen, manufacturing	$102,788,000	$507,688,000	$600	$864
Meat processed from carcasses	$93,527,000	$1,579,460,000	$546	$2,688

In the table below, we compare the agricultural production value to the value of processing sales.[2,3] The production value represents the value of the raw product, while the processing sales represents the value from processing the raw product. The last column shows the ratio of the raw product value to the processing sales. A higher value in the last two columns represents a high processing value compared to the production value. For example, for every dollar of raw milk production, Kent and Ottawa produce nearly $27 in sales of dairy products.

Agricultural Product - Associated Processing Sectors	Agricultural Production Value		Processing Sales		Processing : Production Ratio	
	Five County Area	Kent & Ottawa	Five County Area	Kent & Ottawa	Five County Area	Kent & Ottawa
Fruits and Vegetables - Frozen Fruits/Juices, Frozen Specialties, Canned Goods	$200 million	$534 million	$1.37 billion	$913 million	6.8	1.7
Milk - Cheese, Dry Dairy, Fluid Milk, Butter, Ice Cream	$140 million	$63 million	$412 million	$1.69 billion	2.9	26.9
Cattle and Hogs - Animal (Except Poultry) Slaughtering	$96 million	$130 million	$53 million	$82 million	0.6	0.6
Cattle, Hogs, and Poultry - Meat Processed from Carcasses	$97 million	$301 million	$94 million	$1.58 billion	1.0	5.2

These figures provide some insight into the relationships between agricultural production and processing in the two regions. For example, even though Kent & Ottawa produce a higher value of raw fruits and vegetables, the five-county area has a much stronger processing sector for fruits and vegetables. The opposite is true of milk: Kent & Ottawa produce a much higher value of dairy products given their relatively low raw milk production. The animal slaughtering industries are roughly comparable, but Kent & Ottawa have a stronger meat processing industry.

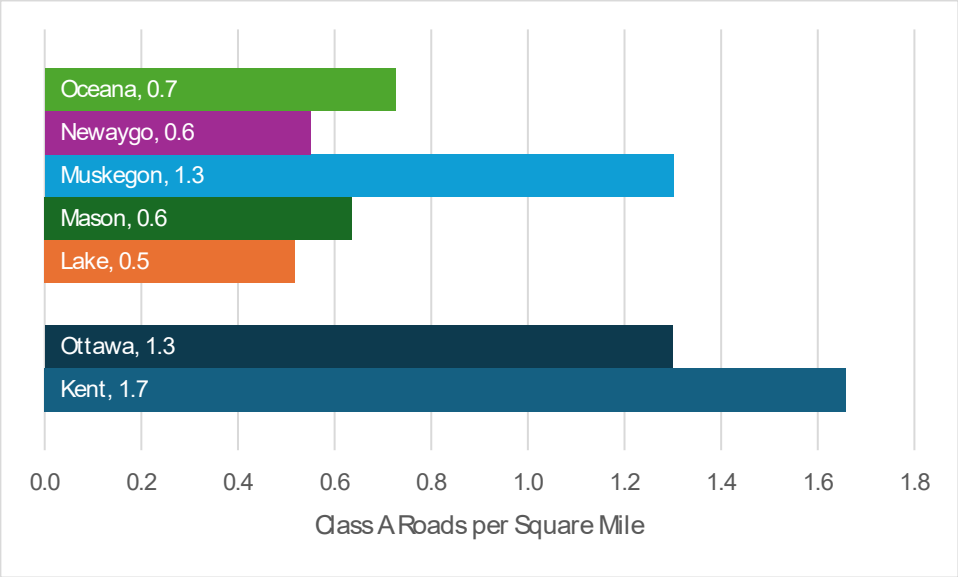
This information could be used to infer the exchange of raw agricultural goods between the two regions. For example, the fact that the five-county area produces more raw milk but Kent & Ottawa produce substantially more dairy products may indicate that raw milk produced in the five-county area is being sent to Kent & Ottawa for processing. Interviews have proven this to be the case with milk, and it may be true of the other products in this analysis, but a direct relationship cannot be determined from this data alone. Because of the import and export of agricultural goods, the data above cannot be used to determine direct relationships between production and processing between the two regions.

Comparison of Important Factors

Infrastructure

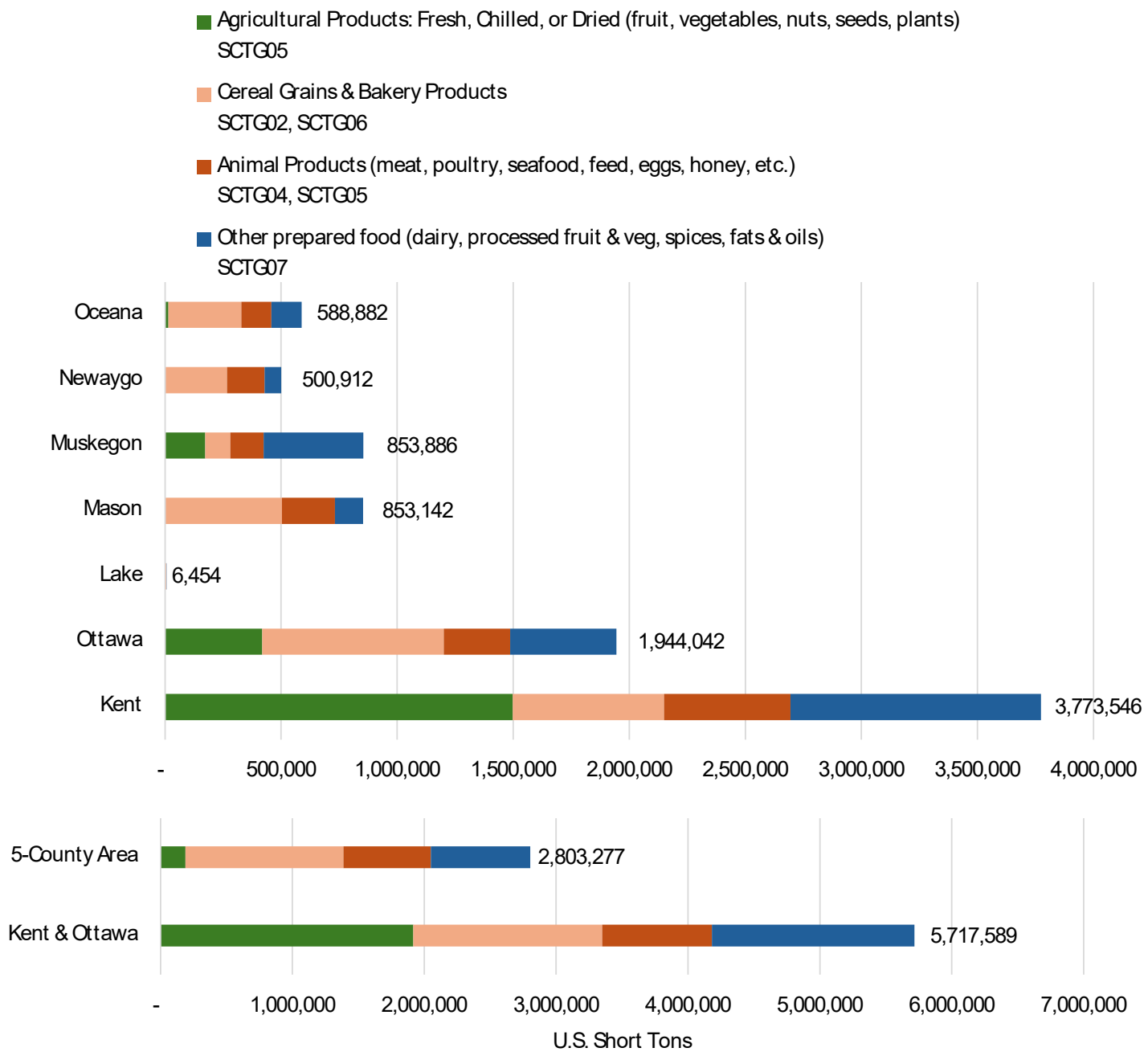
The capacity and capability of roads is a critical factor to the agricultural processing industry in West Michigan. Large processing operations require roads that allow tractor-trailer transport and can facilitate the inflow of raw materials for processing and the outflow of finished products. Year-round operations need Class A roads that can handle freight travel during all seasons. This factor is explored further in the Market Analysis.

The figure below shows the availability of Class A road miles per square mile of area for each county.[6] As the figure shows, Kent & Ottawa counties generally have a higher density of Class A roads than the Five County Area. This could be an advantage when attracting agricultural processors that require year-round transportation of goods and products.

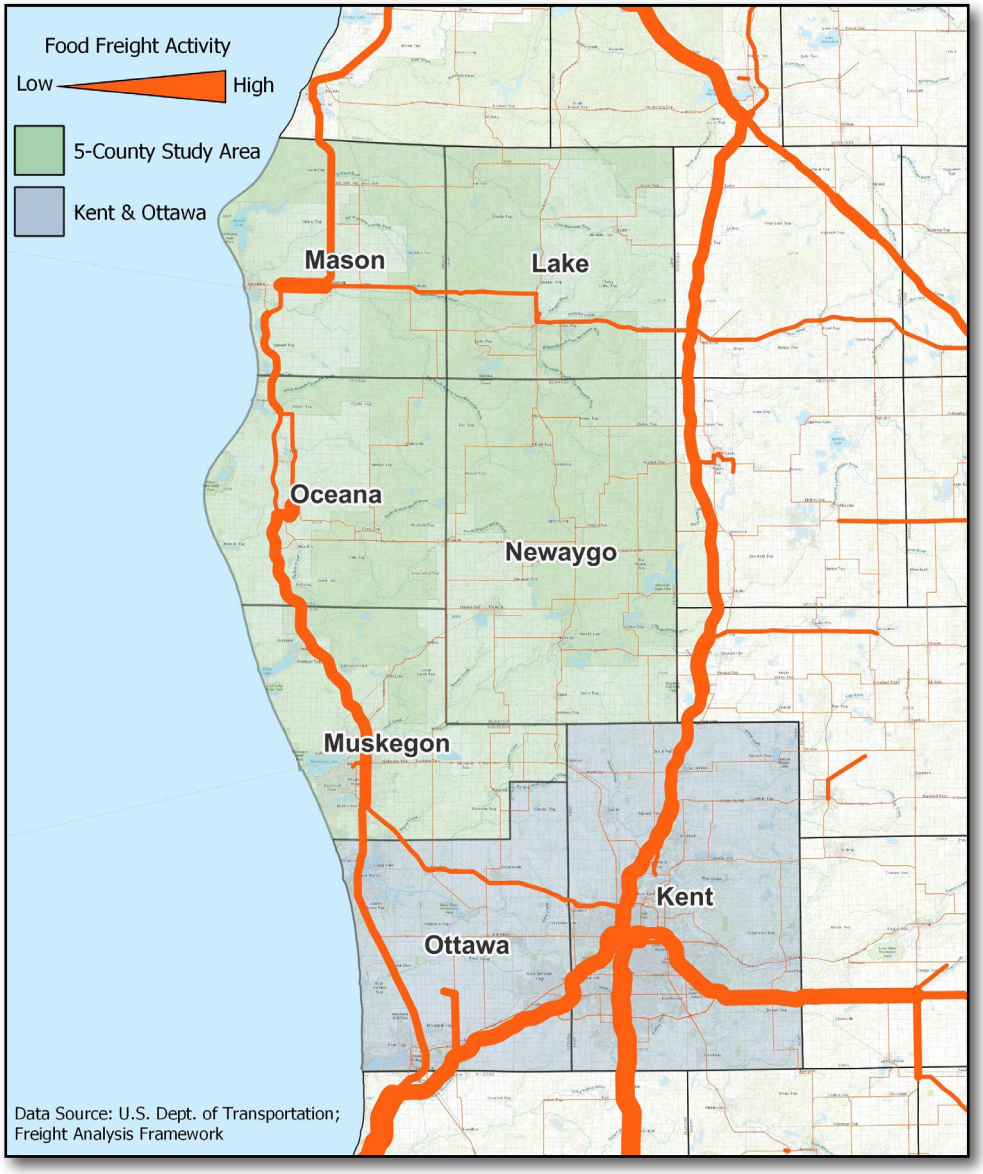


Along these roads, data from researchers at the University of Illinois can be utilized to understand food flows originating from of each county. The Food Flow Model (FFM) aggregates data from the national Commodity Flow Survey in 2017 and the Freight Analysis Framework published by the Department of Transportation[4] and models the transportation of over 370 food commodities. The output of the model illustrates the magnitude of activity - food outflows by weight - in the food chain network in Michigan counties in 2017.

While previous sections of this report detail and compare production volumes, this data alternatively informs how much production actually leaves each county by truck, rail, boat, or otherwise - which in turn provides insight into the utilization of freight infrastructure which facilitates that movement. The following figure shows the total outflow of food by county and commodity group. From this data, it is clear that more agricultural product (by weight) moves through freight networks originating in Kent & Ottawa than the study area.


Agricultural Products: Fresh, Chilled, or Dried (fruit, vegetables, nuts, seeds, plants)
SCTG05
Cereal Grains & Bakery Products
SCTG02, SCTG06
Animal Products (meat, poultry, seafood, feed, eggs, honey, etc.)
SCTG04, SCTG05
Other prepared food (dairy, processed fruit & veg, spices, fats & oils)
SCTG07
Oceana
588,882
Newaygo
500,912
Muskegon
853,886
Mason
853,142
Lake
6,454
Ottawa
1,944,042
Kent
3,773,546
-
500,000
1,000,000
1,500,000
2,000,000
2,500,000
3,000,000
3,500,000
4,000,000
5-County Area
2,803,277
Kent & Ottawa
5,717,589
-
1,000,000
2,000,000
3,000,000
4,000,000
5,000,000
6,000,000
7,000,000
U.S. Short Tons

Another way to utilize the 2017 Commodity Flow Survey (CFS) and the Freight Analysis Framework (Version 5, FAF5) is mapping the estimates of the tonnage and value of transported goods - in this case, total farm products as well as food and beverage products. The data from the FAF5 (developed using the CFS) is used in the figure below to illustrate truck flow by roads in the study area and Kent & Ottawa.[5] These estimates do not necessarily reflect product origin, but show the volume of food-related cargo moving through (and around) west Michigan counties.

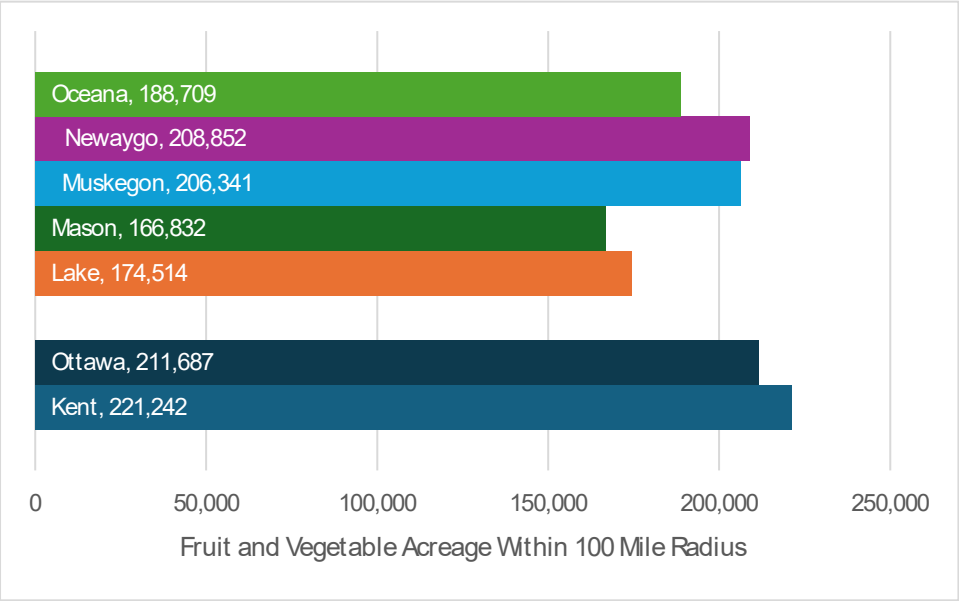


There is a major intersection of I-96, I-196, and U.S. 131 in Kent County near Grand Rapids, where it is clear that a large volume of food cargo routes through. Mason, Oceana, and Muskegon Counties are intersected by I-96, while Lake and Newaygo Counties are largely devoid of major transportation corridors as U.S. 131 routes through the adjacent Montcalm, Mecosta, and Osceola Counties.

These major thoroughfares in the area overshadow the freight activity within the more rural counties, such as Newaygo, though there is still food being transported from, to, within, and through these counties, just to a lower extent. For instance, the large scale Gerber Products manufacturing facility in Fremont is moving processed agricultural products (baby food) to and from their location in Newaygo County, just not a high enough volume compared to networks that span multiple counties and states.

Availability of Crops

Access to locally produced raw fruits and vegetables can inform processors' supply of inputs relative to other places. The figure below compares the total acreage of fruits and vegetables within each county plus an additional 100 mile radius to represent a reasonable transportation range of local agricultural products.[6]



Kent and Ottawa lead in this metric, however, the difference between the counties is not large. The northernmost counties in the study area have the lowest availability of fruit and vegetable acreage, especially the coastal Mason County which is partially limited by geography.

Looking at individual crops (rather than all fruit and vegetable acres) does reveal some disparities in access. For example, Mason and Lake counties have much less access to blueberry acreage but much better access to cherry production. Kent and Ottawa have better access to grapes, peaches, potatoes, wheat, and watermelons, although Muskegon also generally has good access to these crops.

Workforce, Cost of Living, & Quality of Life

The table below compares several demographic characteristics and indicators of quality of life between the Five County Area and the comparison area.[7,8] The Five County Area is much less populous compared with Kent and Ottawa Counties, with a **cumulative population less than a third of the comparison area's population**. A smaller share of the Five County Area population has completed at least some college compared with the population of Kent and Ottawa Counties. Unemployment rates vary by county, but there is weaker labor force participation in the Five County Area compared with that of Kent and Ottawa Counties.

Indicator	Five County Area					Kent & Ottawa	
	Lake	Mason	Muskegon	Newaygo	Oceana	Kent	Ottawa
Population, age 18-65	7,217	15,901	103,970	29,069	15,143	407,067	180,491
Population density (18-65)†	12.72	32.1	206.3	34.7	28.1	479.5	320.3
Unemployment Rates	3.2%	2.5%	4.1%	2.5%	3.2%	2.9%	2.4%
Labor Force Participation Rate	38.1%	50.7%	57.1%	53.0%	50.4%	64.3%	61.7%
Education Level for Population 18+							
At least some college	41.1%	59.1%	56.1%	48.8%	51.5%	66.9%	66.8%
Income							
% Families with children under 18 receiving social assistance such as food stamps	26%	42%	48%	44%	50%	46%	57%
% Poverty level	21%	15%	13%	14%	13%	11%	8%
Income inequality: ratio of highest quintile income to lowest quintile income	12.7	11.8	12.4	11.1	10.8	13.1	10.7
Median household income	$49,680	$62,296	$63,495	$61,931	$63,624	$80,390	$87,144
Childcare‡							
Share of household income, annual	14.2%	9.9%	8.9%	11.0%	11.2%	9.6%	8.5%
Price, annual	$9,422	$8,395	$7,286	$8,547	$8,609	$9,988	$9,481
Housing Affordability							
% Renting population paying more than 30% of income in rent	43%	40%	43%	36%	25%	45%	43%
% Homeowners with mortgage paying more than 30% of income in housing cost	33%	20%	22%	29%	27%	18%	17%
Commute Time							
Less than 25 minutes commute time to work	47%	76%	68%	51%	64%	70%	68%
Violence							
Homicide rate (per 100,000 population)	N/A	N/A	8	3	N/A	5	1
Annual firearm fatalities (per 100,000 population)	20	9	16	14	10	9	5

In general, the Five County Area shows trends that are common in more rural areas: **Higher poverty rates** and **lower median household incomes**.[8] Interestingly, food assistance rates are lower, which may indicate that residents are not collecting benefits that they may be entitled to. Renting is slightly less affordable in Kent & Ottawa, while homeownership appears less affordable in the Five County Area. Childcare is generally cheaper in the Five County Area but mostly less affordable (due to lower relative incomes). While the homicide rate varies by county, and some data is missing, fatalities by firearm (caused by accidents, suicide, or interpersonal violence) appear to be somewhat higher in the Five County Area compared with Ottawa and Kent Counties.

Support Facilities

Agricultural producers and processors often rely on support infrastructure, particularly cold storage and other warehousing, to complete and connect value chains. In interviews with West Michigan producers and processors, cold storage has been described as limited, which can be a barrier to industry growth, especially when privatized. An economic analysis published in 2025 by Michigan State University Extension interviewed agricultural stakeholders across Michigan regarding several issues and identified the outside ownership (privatization) of infrastructure as a threat to Michigan's specialty crop (apples, cherries, blueberries, etc.) industry.[9] Privatization limits who is able to utilize storage by crop types, length of storage, and prohibitive prices, and has been especially prevalent in West Michigan counties.

According to the USDA, in Michigan there are 16 public and nine private refrigerated warehouses representing over **72 million cubic feet** of usable space.[3] To compare the availability of support facilities between the study area and Kent & Ottawa, the ideal metric would be the prevalence and capacity of cold storage facilities by county. The data on cold storage capacity at the U.S. county level is limited, but can be approximated through various resources. While no single source provides a complete picture (and sources rarely distinguish between public or private facilities), considering them together may indicate general trends for the purposes of comparison between the areas.

Source	The Bureau of Labor Statistics' Quarterly Census of Employment and Wages (QCEW) data for businesses that categorize their primary activity as "Farm Product Storage" or "Refrigerated Storage"[1]		A web search of refrigerated storage businesses	
# of Facilities	Study Area	Kent & Ottawa	Study Area	Kent & Ottawa
	3	5	2	10
Limitations	This may not capture cold storage that has a different primary activity (NAICS code), such as a processor that also has storage		Web searches potentially exclude unlisted or mixed category businesses	

Conclusion Both methods of estimating the number of storage facilities suggest that options are *more diverse* in Kent & Ottawa than in the study area. Without capacity information, however, it is difficult to say which of the two areas has more *total* storage availability.

Regulatory Environment

The regulatory landscape for agricultural food processors in the Five County Area versus Kent and Ottawa County is more alike than different when it comes to fundamental rules – state laws on food safety, environmental protection, and farm operations create a uniform baseline across Michigan. Slight differences are mostly in local implementation and focus.

- Kent and Ottawa, facing heavier development and larger-scale industry, have developed **more structured programs** (zoning plans, Purchase of Development Rights (PDR) farmland conservation, vigorous local health inspections for retail food) to manage agriculture's interface with urban growth.
- The Five County Area, with its generally smaller tax base and fewer full-time regulators, leans on state oversight and tends to be accommodating to agriculture-related enterprises as an economic cornerstone. Unique factors such as Lake Michigan shoreline regulations do add an extra layer in coastal counties (including Ottawa, Mason, Muskegon, Oceana) – any processor near critical dunes or water will need state environmental permits that inland Kent/Newaygo/Lake might not encounter.
- Areas like Oceana and Ottawa share the challenge of providing for large seasonal workforces (thus dealing with migrant camp licensing and farm labor regulations intensively), whereas Kent's food industry might be more year-round employment.

Ultimately, the context – urban vs. rural, coastal vs. inland – determines which regulations are most salient (for example, a plant in Grand Rapids focuses on city wastewater bylaws, while a plant in Hart, Oceana County deals with a groundwater discharge permit and migrant housing rules).

Recipes for Success

Kent and Ottawa's success in agricultural processing can provide useful examples for the five-county study area. Their use of tax and funding incentives, industry-focused planning and policy, and use of economic development organizations (EDOs) can all serve as lessons in how to support growth in the agricultural processing industry.

Tax and Funding Incentives

Through tax incentives and public funding, organizations in Kent and Ottawa counties have supported the growth of food processing businesses. Here are some recent examples:

To support a $42-million expansion of King Milling Co. in 2022, the City of Lowell (Kent County) approved a 12-year, **50% tax abatement** for the project. This was coupled with a **$250,000 grant** from the Michigan Commission of Agriculture and Rural Development. The new mill was designed to produce 75,000 pounds of flour per day and support six new jobs in its first two years of operation.[10]

In 2024, the City of Kentwood (Kent County) offered SnackCraft a **50% property tax** abatement to support its $29.9 million capital investment to expand its U.S. headquarters. The project was estimated to support **37 new jobs**.[11]

In 2024, dairy processor Schreiber Foods, Inc. chose to invest $59 million in capital to grow its beverage plant in Wyoming (Kent County). This development was supported with a **$198,000 grant** from the Michigan Business Development Program. The expansion was estimated to support **32 new jobs**.[12]

In 2020, Hudsonville Ice Cream announced it would expand its Holland-based facility (Ottawa County) to include more cold storage and production capacity. The $51-million expansion was supported by a local tax exemption worth almost **$6 million**, a State Education Tax exemption worth roughly **$600,000**, a **$150,000 grant** from the MDARD Food and Agriculture Investment Fund, and a **$457,000 workforce grant** from West Michigan Works!.[13]

Economic Development Organizations (EDOs)

The local EDOs in Kent and Ottawa counties have been pivotal in helping to ensure agricultural processors chose to grow locally. Here are some examples of the role EDOs have played:

- When **King Milling Co**. was applying for a tax abatement to support their expansion in Kent County, The Right Place supported their application and praised its approval.[10]
- Two years before **SnackCraft** announced the expansion of their U.S. headquarters in Kent County, The Right Place was working with them to facilitate future development plans. They also worked closely with the Michigan Economic Development Corporation (MEDC) and other state and local resources to ensure the company continued its growth in Kent County rather than somewhere else.[11]
- During **Schreiber Foods**' decision to expand operations, The Right Place worked closely with MEDC to ensure that expansion occurred in Kent County, and they offered support by effectively organizing state and local resources.[14]
- During **Hudsonville Ice Cream's** planned expansion in Ottawa County, Lakeshore Advantage worked to connect them with state and local resources to support their growth. [13]

These examples highlight the critical role EDOs play in helping ensure agricultural processing companies choose to grow in the area: Acting as de-facto ambassadors between the businesses and governments, helping navigate incentives and permitting, and building networks of relationships that foster development. EDOs operating in the five-county area include the Lake County Economic Development Alliance (LCEDA), the Mason County Growth Alliance (MCGA), Greater Muskegon Economic Development (GMED), and the Right Place (Lake, Newaygo, and Oceana counties). The more support that can be given to these organizations, and the better their ability to strengthen relationships with businesses, government agencies, and each other, the more successful they will be at promoting industry growth.

Industry-Focused Policy and Planning

Various organizations in Kent and Ottawa counties have used policy and planning initiatives to support agricultural production and processing industries. Here are some examples of these initiatives, which demonstrate how policy and planning can bring targeted support to industries and foster the conditions needed to grow target sectors in the future:

Kent County's Food Policy Council completed their **Food System Plan in 2023**. This plan lays out actions that local governments can adopt over the next 10 years to support small food processors. These recommendations include:

- **Supporting** the creation of food business incubators and commercial kitchens
- **Improving** cold storage and transportation to support fresh produce distribution
- **Funding** entrepreneurship programs to support small food and farm businesses
- **Streamlining** regulations and licensure requirements for agricultural businesses[15]

In 2021, the Ottawa County Commission adopted the **"Focus on Agriculture"** plan. The purpose of the plan is to support agriculture by protecting farmland and slowing the loss of farms in the county. To develop it, Ottawa County surveyed agricultural landowners and producers to gather their perspectives on the issue. The survey responses were used to identify specific actions the county could undertake to preserve farms and farmland. Focus areas included developing a comprehensive land use vision and addressing barriers to the economic viability of farming.[16]

In 2013, Ottawa County passed the **Farmland Development Rights Ordinance** which protects farmland by allowing the county to purchase development rights voluntarily offered by landowners.[17] As of fall 2022, the program had been used to preserve nine farms and over 700 acres.[18]

In 2025, Lakeshore Advantage launched a five-year growth plan called **Powering Our Future: The Next Lakeshore Generation**. The plan has a goal to raise $2.3 million to support the region's competitiveness building the workforce, growing existing business investment, and fostering a supportive environment for entrepreneurs. The initiative is targeting 5,000 new jobs and $375 million in new capital investment by 2030.[19]

Synergy & Integration

The five-county study area and Kent and Ottawa counties have a great deal of complementary economic activity that supports industries in both regions. By supporting specific sectors in Kent and Ottawa county, the five-county study area can also foster growth in its own economy. Here are some examples:

1. Meat Processing

As shown in the analysis above, the five-county study area is a large producer of livestock and poultry. **For every dollar of animal production, it produces about $1 of value-added meat processing**. On the other hand, Kent and Ottawa counties produce over $5 in meat processing for every dollar of animal production in the counties. While there are many extraneous factors that influence this relationship, it illustrates the strength of the meat processing industry in Kent and Ottawa counties. This is in part due to the presence of large meat processors in the counties, including JBS USA and Tyson Foods. Growth in the meat processing industry in Kent and Ottawa helps support animal production in the five-county area.

2. Fruit and Vegetable Processing

The five-county study area has a very strong processing sector for fruit and vegetables. The analysis above illustrates how the region is able to capitalize on its strong fruit and vegetable production and transform it into value-added juices, frozen and canned goods, and other products. Kent and Ottawa counties have their own strong fruit and vegetable production, with Ottawa being particularly strong in vegetables and Kent in fruit. The production in these two counties helps supply processors in the five-county study area. Helping to support production in Kent and Ottawa can help ensure the processing sectors in the five-county study area continue to have the inputs needed to grow their businesses.

3. Milk Production

Raw milk production in the five-county study area is more than **twice the value** of Kent and Ottawa counties ($140 million versus $63 million).[3] However, Kent and Ottawa produce about four times the value of dairy products (including processed milk, cheese, ice cream, butter, etc.). Large dairy processors such as Country Fresh, Continental/Fairlife, and Hudsonville Ice Cream help drive the success of the industry in these counties. Many dairies in the five-county area rely on these businesses (and others in Kent and Ottawa counties) to buy their milk. Supporting the dairy products industry in Kent and Ottawa counties helps support dairy farmers in the five-county study area.

4. Wastewater Treatment

The "Southeast Regional Force Main" pipeline project is a good example of an initiative that benefits industries in both the five-county study area and its neighboring counties. This pipeline will connect the Muskegon County Resource Recovery Center (MCRRC) wastewater treatment plant with multiple food processing facilities, including Fairlife/Continental Dairy (Ottawa), Applegate Dairy (Muskegon), Swanson Pickle Company (Muskegon), and DeVries Meats (Ottawa). The project will provide these companies with an outlet for their wastewater, which was inhibiting some expansion plans, and allow the MCRRC to make use of excess treatment capacity. The pipeline will enable the companies to make about **$187 million in private investments** over the next 3 to 5 years and add up to **145 jobs**.[20] This serves as a good example of how resources in the five-county study area can be used to support agricultural processing both inside and outside the five-county area, while also supporting the agricultural producers in the region that supply the processors (as described in the previous examples).

5. Attracting Workers

One of the main challenges in the five-county study area is a lack of available workers with the necessary skills to serve the agricultural processing sector. Grand Rapids has a comparatively large and well-educated population. Attracting workers from the city is one way the five-county area could bolster its workforce. While some people may be willing to make a long commute to work in the study area and live in Grand Rapids, most people would probably prefer to avoid that much time on the road. Therefore, in order to attract workers, the study area would have to present an attractive place to live as well as work. This means improving the factors that influence a person's (or family's) decision to permanently relocate: **affordable housing**, **affordable childcare**, **transportation**, and places that are enjoyable to live and recreate. Our survey showed that nearly all West Michigan stakeholders felt that the region has a high quality of life, which bodes well for attracting new residents. However, the lack of affordable housing and childcare were often cited as barriers to economic development. Creating these favorable and affordable living conditions is not a direct path towards growing the agricultural processing industry but would be a key strategy that would help all industries in the five-county area.

Regional Collaboration & Investments

The integrated nature of agricultural production and processing in the region creates opportunities for regional collaboration and investments. This section describes potential cross-border efforts to support the industry throughout West Michigan.

Coordination Between Economic Development Organizations

West Michigan has a variety of organizations dedicated to strengthening its economy:

- EDOs (Lake County Economic Development Alliance, Mason County Growth Alliance, Muskegon Greater Muskegon Economic Development, Newaygo County Economic Development Partnership, Oceana County Economic Alliance, The Right Place, Lakeshore Advantage),

- Workforce development agencies (West Michigan Works!, Michigan Works! West Central), Metropolitan Transportation Planning Agencies: MPOs (WMSRDC, Grand Valley Metropolitan Council, Macatawa Area Coordinating Council),
- And regional planning and development organizations (WMSRDC).

Each of these organizations has its own resources to contribute to the mutually shared goal of growing the West Michigan economy, including its agricultural processing sector. The greatest potential for regional collaboration comes from these organizations working together to foster the conditions needed to support and grow the industry: An abundant and capable workforce, infrastructure that meets the needs of businesses, financial conditions that are attractive to growing businesses in the area. Wherever possible, these organizations should make efforts to build relationships with each other, the businesses in their areas, and with other decision-makers who can help in their goals.

Transportation Initiatives

This study has shown that transportation is a key factor affecting the agricultural processing industry. To create a thriving sector, raw inputs, processed products, and workers must be able to move efficiently. A strong transportation network is an essential component. Because of the interdependent nature of the agricultural processing industry between the five-county study area and its neighboring counties (Kent and Ottawa), transportation networks must allow for efficient movement across West Michigan. For this reason, regional transportation initiatives are necessary to ensure goods and people can move fluidly between all seven counties and beyond. Regional planning for transportation is essential to providing these conditions in the future. Decision-makers from all West Michigan should be engaged in cooperative planning to ensure that transportation networks (especially roads) meet the needs of the agricultural processing industry. **Businesses reported the lack of public transportation as a barrier to gaining and retaining workers**. Cross-county public transportation studies could help determine what initiatives could be beneficial to the regional economy.

Regulatory Reform

A common theme among agricultural processors was the difficulty posed by state-level wastewater regulations (EGLE). Almost without exception, businesses reported that the regulatory process for wastewater was a barrier to their current operations and to any plans for expanding. Their complaints center around a few issues:

- The pollutant standards for wastewater discharge are **too stringent** (to the point where even discharging pure groundwater would be non-compliant)
- The standards and expectations are unclear to begin with and **change unexpectedly**, making it exceedingly difficult to plan and make business decisions
- The regulatory process **takes much too long**, often many years and incurring **high costs** just to go through the process.

Without change, these challenges will continue to serve as a hindrance to the agricultural processing industry in West Michigan. One way to support the industry would be to push for regulatory reform at the state level. Advocating for the following changes could help this industry:

- **Loosening wastewater standards** to the point where they allow businesses to operate and still reasonably protect the public interest in environmental quality
- **Clarifying standards** and ensuring that changes to the standards are communicated to and understood by processors
- **Streamlining the approval process** so it takes much less time.

These initiatives would have broad appeal to many industries across the state of Michigan, which provides an opportunity to partner with other industry groups and EDOs across the state to advocate for change. The scale of frustration with EGLE regulations was demonstrated in March 2025 when farmers, food processors, and other industry stakeholders protested at the state capitol in opposition to EGLE regulations and actions.

Limitations

The Five County area faces some limitations to growing the agricultural processing sector. This section describes some natural limitations of the region and suggests potential ways to address them.

1. Rural Nature

Compared to Kent and Ottawa Counties, the five-county study area is much more rural. While this works as an advantage when it comes to agricultural production, it can pose a challenge to the agricultural processing industry. Cities benefit from network effects: Greater resource availability, proximity to markets, larger workforce pools, lower transportation requirements for goods and workers, and often better access to utilities. These natural benefits of urban areas will continue to serve as an advantage for Kent and Ottawa County and disadvantages for the five-county study area. While these dynamics cannot be easily changed, the study area can capitalize on its relative strengths (lower housing costs in many areas, lower childcare costs, and proximity to agricultural production) in the ways noted above.

2. Proximity to Markets

The location of the five-county study area and the peninsular nature of Michigan give Kent and Ottawa counties a natural geographic advantage in their proximity to markets. Kent and Ottawa are closer to the large markets in Detroit, Chicago, Indianapolis, and Cleveland, making these counties potentially more attractive to agricultural processors that want to ship to these markets. The degree to which this distance affects business operations and siting decisions will likely vary between companies (the distance may be prohibitive for some and negligible for others). While the study area cannot change its geography, it can work to ensure that its transportation networks allow for the most efficient movement of goods possible. Supporting initiatives to maintain and improve transportation networks (as described above) will help to minimize this natural geographic disadvantage.

3. Limited Funding Mechanisms

The smaller population in the five-county study area typically translates into less funding available to help businesses develop. While there are exceptions (such as federal grants targeted at rural development), more populous areas like Kent and Ottawa can often attract more outside funding. Here are some examples of funding mechanisms that could attract that development toward Kent or Ottawa:

- **"Powering Our Future" fund** – This grant funding is available in Ottawa County to offset the costs of early engineering, employee-training, or specialized utility studies. The fund is administered by Lakeshore Advantage.
- **"Urban-County" CDBG infrastructure grants** – Because Kent is a HUD "urban county," it receives an annual formula Community Development Block Grant allocation (about $2 million per year). It can sub-grant to townships for water-sewer, roads, or site preparation, and help businesses developing on the urban edge. While this funding could be available to the five-county study area, they would have to compete for this money instead of it being automatically allocated.
- **Brownfield Redevelopment Funds** – Ottawa County and Grand Rapids both have funding available to help redevelop brownfield sites. Ottawa's fund fully covers the site assessment (lowering the cost for the prospective developer) and Grand Rapids' fund provides low-interest loans or grants to cover cleanup, demolition, or utility upgrades.

The larger taxes bases of Kent and Ottawa also generate more tax revenue, which makes it easier to develop infrastructure, provide grants and loans, and offer tax breaks to businesses expanding in the area. This economic advantage is likely to persist into the future. To counteract this, counties in the study area should focus efforts on attaining funding that would not be available to Kent and Ottawa counties or would be harder to attain. Some examples may include:

- **MDARD Rural Development Fund Grants**
- **Michigan "Rural Readiness" Grants**
- **USDA Rural Business Development Grants**
- **USDA Rural Innovation Stronger Economy (RISE) Grants**
- **USDA Rural Economic Development Loan & Grant (REDLG)**
- **USDA Community Facilities Direct Loans & Grants**

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Appendix: Methodology

This section describes the methodology used to conduct the study. In general, our methods involved compiling and synthesizing information from a wide range of sources:

- **Surveys** – distributed to agricultural producers, processors, economic development organizations, and public officials. As the surveys were not designed for statistical inference, results were analyzed qualitatively rather than quantitatively. Responses were also used to develop more focused lines of investigation.
- **Interviews** - farmers, processors, supporting businesses and organizations, educators, economic development organizations, and public officials
- **Site visits** - farms, food processing facilities, wastewater facilities, and business incubators
- **Public datasets** – such as the Bureau of Labor Statistics Quarterly Census of Employment and Wages, the USDA's Census of Agriculture, and the U.S. Census Bureau's American Community Survey
- **Proprietary datasets** – IMPLAN model
- **Public reports and news articles**
- **Spatial analysis** – contributed by the MSU GIS team

The economic impact analysis employed the IMPLAN input-output modeling system to estimate the economic contribution of the agricultural processing industry to the regional economy. IMPLAN is a widely used regional economic modeling tool that describes the purchasing relationships between industries, households, and institutions, and it enables the estimation of both direct and secondary (also known as indirect and induced, or multiplier) economic effects.

While we refer to this section as an 'economic impact analysis' consistent with common usage, the estimates presented represent industry contributions, i.e., the total amount of economic activity supported by the agricultural processing industry. Our economic contribution analysis measures all of the economic activity linked to processing industries in the region, while a true economic impact analyses would measure how the economy would change in the absence of an industry, policy or activity. The difference is that there is some economic activity that is linked with or associated with processing that would likely still occur in the absence of the processing industry. For example, the agricultural production that feeds into the processing sector is closely linked to processing, but much of this agricultural product would likely not cease to exist in the region absent the processing sector. A contribution analysis does not account for what would happen if not for the presence of the processing sector (i.e., would agricultural producers export more product, would workers find alternative employment or receive income from other sources, etc.).

The procedure involved the following steps:

- **Defining the study area** – The model was constructed for each of the five counties in West Michigan study area (and separately for the two comparison counties, Kent and Ottawa, in the Comparative Analysis) using IMPLAN's 2023 data set, which incorporates county-level employment, output, and trade flow data.
- **Selecting industries** – Relevant IMPLAN sectors corresponding to the agricultural processing industry—including food, beverage, and wood product manufacturing (IMPLAN Industry Codes 58–59, 68–103, 125–143)—were identified for inclusion.

- **Establishing direct effects** – The direct activity of each sector was specified in terms of employment and output. IMPLAN's default values for employment and output were used as a starting point, with adjustments informed by interviews with company representatives and publicly available data on employment and sales.
- **Running the IMPLAN model** – The industry contribution analysis was performed in IMPLAN for each of the five counties, which reports the total economic impact (direct + indirect + induced) employment, income, and tax revenues associated with each industry. Specifically, measured effects include:
  - » **Direct employment and income in processing sectors.**
  - » **Indirect employment and income in sectors providing inputs to processing sectors (agriculture, transportation, real estate, trade, utilities, etc.)**.
  - » Induced employment and income in sectors providing goods and services to workers spending income earned in direct or indirectly affected industries.
  - » **Estimated tax revenues**, supported by the economic activity in direct, indirect, and induced sectors, including fiscal revenues to local, state, and federal governments

Within the Economic Impact Analysis section of the report, we make multiple references to agricultural production value. This is the gross value of agricultural products sold at the farmgate. Where data were available, total sales values from the 2022 Census of Agriculture were used. For many crops, county-specific values of total sales were unavailable. In these cases, we combined data on harvested acreage, average yield, and average prices to estimate total sales value. When 2022 data on harvested acreage was unavailable, we used 2017 data. We multiplied the acreage by the average yield at the county, state, or national level, using the most precise geographic data available. We then multiplied the resulting estimate of total yield by the average price per unit at the state or national level, again using the most precise geographic data available.

The SWOT analyses included in the economic profiles were completed by Highland Economics staff with input collected from key stakeholders during interviews and surveys conducted for this study. Additional data points were often relied upon - public and proprietary data, reports, and news - to identify a region's internal strengths and weaknesses, as well as what external opportunities or threats may exist.