



Middlesex County Census of Agriculture Summary

Statistics Canada 2016



www.investinmiddlesex.ca

Executive Summary

The County of Middlesex is an upper-tier municipality comprised of eight local municipalities covering an area of 285,000 hectares, with a population of approximately 75,000 people. The County is situated in the heart of Southwestern Ontario and is bisected by two major transportation routes, Highways 401 and 402. Middlesex has some of the richest agricultural lands in Southwestern Ontario and has direct access to two major border crossings to the United States: Windsor/Detroit and Sarnia/Port Huron; and good access to Fort Erie/Buffalo. Data released from the Statistics Canada's 2016 Census of Agriculture has proven Middlesex County to be abundant in agricultural and technical innovation.

Middlesex County farmers are a large contributor of Ontario major field crops including winter wheat, oats for grain, barley for grain, mixed grains, corn for grain, corn for silage and soybeans. Middlesex farms grow 10% of all Ontario's major vegetable crops including 33% of the Ontario's green peas and 23% of Ontario's green & wax beans. There are 3,260 farm operators working 2,335 farms, with a land total in crop of 500,925 acres. The average age of a farm operator in Middlesex County was 55.5 years in 2016, which is on par with the national average. The agri-food and agriculture industries are the largest employers and account for a total of 20% of local employment.

The complexion of agriculture in the County of Middlesex has changed somewhat in the last decade. The five main commodities: corn, soybeans, swine, dairy, and poultry, represent a consistently large share of total farm cash receipts for the County. In addition, field vegetables for processing are a high value crop. However, agricultural production and farm receipts fluctuate from year to year based mainly on commodity prices (demand).

Since 2011, there has been an increase in the number of Middlesex farms growing cabbage, carrots, cauliflower, cucumbers, spinach, green peas, lettuce, oats, peppers, potatoes, rutabagas and turnips, rye, squash, zucchini, and tomatoes. Since 2011 there has been 100% or more growth in the number of Middlesex farms growing asparagus, Chinese cabbage, cherries, flaxseed, ginseng, mushrooms, pears, shallots and green onions, and triticale.

Livestock is an extremely important part of Middlesex County agriculture. Farmers housed more pigs, poultry, and turkeys in 2016, than any year before. 17% of the Ontario's turkeys are raised on Middlesex farms. Middlesex County also saw a large increase of farms reporting honeybees, with a total increase of 85%. Total farm capital in Middlesex County which includes land, buildings, livestock, and machinery was up 65% from 2011 for a total of \$7.8 billion; with the average Middlesex County farmer reporting \$3.56 million in capital assets compared to the Ontario average of \$2.27 million.

Since Canada's confederation in 1867, there is an inversely proportional trend relating farm size and the frequency of the number of farms. Middlesex County is no exception to this trend as the number of farms decreased from 2,220 in 2011 to 2,199 in 2016, while acreage sales increased from 581,615 in 2011 to 584,722 in 2016.

The use of digital technology and software in agriculture is advancing at an unprecedented rate. There has been great innovation in Middlesex County with the integration of new alternative fuel sources including solar, wind and bio-fuel crops. Precision farming, variable rate technology in crops, biotech enhanced crops, robotics and automation on farms are all examples of technology currently being used by farms and the agri-business industry in the County of Middlesex. Farmers are also on the forefront of using technology like computers for farm management, automated steering, GIS mapping, and greenhouse automation. In addition, high-precision guidance and real-time sensors are used to customize planting location, distance, and depth or deliver inputs by location and amount.

Farms and Operators



There are 3,070 farm operators working 2,199 farms in Middlesex County. This accounts for 500,925 total acres of land.

Gender:

- The male/female split among farm operators in Middlesex County is about 70%/30%, which is consistent with provincial statistics

Average Age:

- The average age of a farm operator in Middlesex County was 55.5 years in 2016. This is up from 2011 when the average age was reported as being 54.9. Across the province the average age was 55.3 in 2016, up 0.8 years from 2011.

Farms, Operators, Middlesex County	Middlesex County (2016)
Number of Farms	2,199
Number of Operators	3,070
Average age of Operator	55

Employment

Middlesex County's agriculture sector contributed a total of 3735 jobs to the local economy in 2016. 33% of those jobs are year-round, full time positions. In addition, Middlesex County hosted another 8060 Agri-food related employment opportunities in 2016. These jobs in total represent some 20% of employment in the County.

Farm Capital Value, Gross Receipts & Expenditures



Capital asset values in Middlesex County rose considerably from 2011 to 2016. Total farm capital, including land, buildings, livestock and machinery in Middlesex County rose to over \$7.83 billion in 2016. On average, farm capital per farm was reported at \$3.56 million. This is considerably higher than the reported Ontario average of \$2.537 million per farm.

Farm Capital - Middlesex County	2016	2011	% of Change	Average Per Farm
Total farm capital market value	\$7,836,692,254	\$4,745,535,919	65%	\$3,563,752
Total value of land and buildings	\$7,160,451,947	\$4,252,901,106	68%	\$3,256,231
Total value of all farm machinery and equipment	\$494,486,625	\$388,587,710	27%	\$224,868
Value of livestock and poultry	\$181,753,682	\$104,047,103	75%	\$82,653

Crops

From an acreage standpoint, the fields of Middlesex County are represented by a diverse collection of crops (see chart p6).

Middlesex County is dominated by three main crops: corn, soybeans and wheat. Other significant crops include alfalfa and edible beans.

Total land in crops in Middlesex County makes up 5.55% of Ontario; an increase of 17% over 2011.



Top Growing Region

Middlesex County is among Ontario's leading farming regions growing 33% of green peas, 23% of green and wax beans, and 9.9% of the province's sweet corn.

Changes in Fruit & Vegetable Plantings

Planting of apples, cucumbers, cauliflower, tomatoes, spinach, carrots, green and wax beans, green peas, strawberries, oats, squash & zucchini, rye, and soybeans increased in acreage size from 2011 to 2016 in Middlesex County.

Planting of broccoli, raspberries, barley, beets, fry field peas, dry white beans, peaches, plums, pumpkins, and sweetcorn decreased in acreage size from 2011 to 2016 in Middlesex County.

Analysis of data shows total vegetables and fruit plantings resulted in a slight increase in acreage overall in Middlesex County from 2011 to 2016.

Grains & Oilseed

In Middlesex County corn for grain is the largest grown crop in the county, and soybeans are the second largest grown crop. Acreage for both corn for grain and soybeans increased from 2011 to 2016. Rye also greatly increased in acreage from 2011 to 2016. Barley and wheat acreage decreased from 2011 to 2016.

Greenhouse

Greenhouse area increased significantly from 564,481 square feet in 2011 to 1,582,733 square feet in 2016. Greenhouses in Middlesex County are primarily used for floriculture and nursery; making up 3.17% of all floriculture and nursery in the province.

Chart: Crops In Middlesex County	Acres or Square feet or Count – as noted (2016)	Acres or Square feet or Count – as noted (2011)	% Change Acres	Farms (2016)	Farms (2011)	% Change Farms
Alfalfa	25,633	26,286	-3%	575	664	-13%
All tame hay/fodder	4,887	6,074	-20%	194	189	3%
Apples	648	557	16%	18	19	-5%
Apricots	0	x		0	1	-100%
Asparagus, non-producing	x	x		2	1	100%
Asparagus, producing	x	x		9	9	0%
Barley	328	1,001	-67%	13	30	-57%
Beets	x	x	-	15	15	0%
Blueberries	x	9		2	4	-50%
Broccoli	x	7	-	9	10	-10%
Brussels sprouts	x	1		5	8	-38%
Buckwheat	x	0		1	0	
Cabbage	x	x		15	10	50%
Canola	x	x		2	2	0%
Carrots	x	x	-	15	14	7%
Cauliflower	x	5	-	8	7	14%
Celery	x	0		1	0	
Cherries (sour)	x	0		1	0	100%
Cherries (sweet)	x	x		1	4	-75%
Chinese cabbage	x	x		2	1	100%
Christmas trees	x	174	-	14	15	-7%
Corn for grain	174,460	168,987	3%	1,176	1,193	-1%
Corn for silage	13,264	11,350	17%	221	222	0.45%
Cucumbers	x	x	-	19	15	27%
Dry field peas	158	369	-57%	2	3	-33%
Dry onions, yellow, spinach, cooking, etc.	x	x		17	12	42%

Dry white beans	x	4,390	-	35	39	-10%
Flaxseed	x	x		2	1	100%
Fruits, berries, nuts (all)	807	722	12%	43	44	-2%
Fruits, nuts, berries (other)	x	x	-	6	7	-14%
Ginseng	147	x		6	2	200%
Grapes	x	x		2	3	-33%
Green and wax beans	1,720	1,595	8%	34	34	0%
Green peas	4,838	4,490	8%	69	57	21%
Greenhouse Total (sq. ft.)	1,582,733	564,481	180%	31	37	-16%
Greenhouse Flowers (sq. ft.)	x	382,114	-	21	20	5%
Greenhouse Other (sq. ft.)	x	49,597		10	9	11%
Greenhouse Veg (sq. ft.)	x	132,800		8	11	-27%
Lettuce	x	x	-	10	8	25%
Maple Taps (Count)	57,529	53,066	8%	61	54	13%
Mixed Grains	1,120	1,055	6%	51	51	0%
Mushrooms (sq. ft.)	x	x		2	1	100%
Nursery	376	322	17%	38	33	15%
Oats	1,399	1,130	24%	75	66	14%
Peaches	8	15	-47%	5	6	-17%
Pears	x	x		6	10	-40%
Peppers	x	x	-	20	16	25%
Plums and prunes	1	6	-83%	3	6	-50%
Potatoes	55	58	-5%	14	11	27%
Pumpkins	27	33	-18%	17	21	-19%
Radishes	x	1		3	4	-25%
Raspberries	12	x	-	5	12	-58%
Rutabagas and turnips	x	145		7	5	40%
Rye	x	783	-	32	20	60%

Shallots and green onions	x	1	-	6	3	100%
Sod	1,082	1,082	0%	5	5	0%
Soybeans	167,918	156,656	7%	1,265	1,271	0.47%
Spinach	5	x	-	8	6	33%
Squash and zucchini	133	100	33%	28	23	22%
Strawberries	x	x	-	10	13	-23%
Sunflowers	x	151	-	3	5	-40%
Sweet corn	2,271	2,754	-18%	47	53	-11%
Tomatoes	x	x	-	25	20	25%
Triticale	224	x		4	2	100%
Vegetables (all)	x	10,617	-	135	126	7%
Vegetables, other	1,105	x	-	39	32	22%
Wheat (all)	83,170	96,377	-14%	884	1,006	-12%

x – no data available

Livestock

Livestock is an extremely important aspect of Middlesex County's agriculture sector; most notably turkey, poultry, pigs and cattle. In fact, Middlesex County houses 17% of Ontario's turkeys.

Livestock and poultry per Middlesex County farms were valued on average at \$168,446 in 2016. Across Ontario, the comparable number was approximately \$136,000.

Middlesex County farmers housed more cattle, pigs and turkeys in the 2016 Census; compared with the 2011 Census, while the sheep, horse, rabbit and poultry inventory decreased. The number of honeybee farms increased by 85% when comparing the Census data from 2011 to 2016.



Livestock Middlesex County	Count (2016)	Count (2011)	% Change Count	Farms (2016)	Farms (2011)	% Change Farms
Cattle and calves	62, 617	61, 244	2%	523	592	-11%
Sheep & Lambs	8, 505	10, 836	-21%	92	131	-29%
Swine	335, 852	296, 334	12%	100	103	3%
Horses and ponies	2, 645	3, 528	-25%	358	398	-10%
Goats	2, 829	x	-	59	66	-11%
Llamas and Alpaca	147	173	-15%	20	23	-13%
Rabbits	1, 194	x	-	21	31	-32%
Bisons (buffalo)	x	x		1	1	0%
Elk (wapiti)	-	-		0	0	
Deer (excluding wild deer)	x	49		2	4	-50%
Mink	x	x		1	2	-50%
Poultry	2, 554, 895	2, 811, 828	-9%	91	93	2%
Turkey Production (year prior (kg))	x	x	-	18	19	-6%

Table Egg Production (year prior-dozens)	x	x	-	112	109	3%
Colonies of Honeybees	1, 281	1, 385	-7%	37	20	85%

Farmland and Uses



Middlesex County prides itself on its agricultural practices. Its rich soils and relatively flat land make it the perfect location to maximize crop production and agricultural success. Middlesex County alone accounts for 0.54% of total Canadian crop land acreage, and furthermore 5.6% of total Ontarian farm acreage.

Geography	Acreage
Canada	93,382,638
Ontario	9,021,298
Middlesex County	500,925
Southwest Middlesex	63,058
Strathroy-Caradoc	46,376
Thames Centre	69,644
Middlesex Centre	120,250
North Middlesex	105,581
Adelaide Metcalfe	59,379
Lucan Biddulph	36,637

No-Till Practices

Environmentally friendly and sustainable practices are readily observed in Middlesex County. No-till agricultural practices leave the soil and land undisturbed, preventing soil erosion and runoff contamination. 7.4% of Ontario's No-Till Seeding practices occur in Middlesex County.

Geography	Acreage
Canada	48,172,870
Ontario	2,134,264
Middlesex County	158,009
Southwest Middlesex	24,935
Strathroy-Caradoc	11,256
Thames Centre	12,477
Middlesex Centre	39,289
North Middlesex	40,477
Adelaide-Metcalf	17,588
Lucan Biddulph	11,987

****7.4%** of Ontario's No-Till Seeding practices occur in Middlesex County

Tree and Woodland Farms

Middlesex County contains a wide variety of agricultural divisions. It's close proximity to Lake Huron and Lake Erie provide a moderating effect resulting in a comfortable four season climate, perfect for growing Spruce, Pine and Fir trees. In fact, 4.4% of Ontarian Christmas Tree, woodland and wetland farms are located in Middlesex County.

Geography	Farms Reporting
Canada	96214
Ontario	29637
Middlesex County	1309
Southwest Middlesex	169
Strathroy-Caradoc	153
Thames Centre	228
Middlesex Centre	297
North Middlesex	234
Adelaide-Metcalf	141
Lucan Biddulph	87

***4.4%** of Ontarian Christmas Tree, woodland and wetland farms are located in Middlesex County

Maple Syrup

Other unique agricultural practices are rapidly growing in Middlesex County. One of these practices are that of maple syrup farms. There has been a 12% increase in the number of Middlesex Maple Syrup Farms in the last 5 years.

Geography	2011	2016
Southwest Middlesex	1	6
Strathroy-Caradoc	6	3
Thames Centre	8	12
Middlesex Centre	19	17
North Middlesex	12	15
Adelaide-Metcalf	6	6
Lucan Biddulph	2	2
Middlesex County	54	61

Irrigation and Inputs

In Middlesex County, the number of farms irrigating increased by 27% between 2011 and 2016; from 52 farms in 2011 to 66 farms in 2016.

Across Ontario, the number of farms using irrigation increased by 25% and the total area irrigated increased by 16% over five years.



Lime and Manure

Use of solid or composted manure decreased by 2.9% from 751 farms in 2011 to 729 farms in 2016. Use of liquid manure decreased by 0.6% from 327 farms in 2011 to 325 farms in 2016.

Tenure

In terms of tenure, most farm land in Middlesex County is owned by the farm operator: 416,914 acres, up 2.3%. Area rented or leased from others was 155,711 acres, down 12.6%. Area crop-shared from others was 34,442 acres, up 21.2%. Area of land used by others was 26,315 acres, down 29.5%.



Non-Farm Work

Non-farm Work	2016	2011	% Change
0 hours/week	1,600	1,655	-3.3%
Less than 20 hours/week	225	265	-15.1%
Between 20-29 hours/week	175	195	-10.3%
Between 20-40 hours/week	425	430	-1.2%
More than 40 hours/week	650	680	-4.4%

The above table explains average time spent by number of farm operators for all other paid work during the calendar year prior to the census.

Succession Planning

In Middlesex County, 261 farms reported having a written succession plan for the operation. These plans are in place for farms to be passed down to other family members or investors in order to sustain the operation. With the average age of local farmers sitting at 55, succession planning is becoming increasingly important for sector sustainability.

Farm Gate Sales & CSAs

Community supported agriculture programs (CSAs) are an alternative model of local food distribution that sees consumers sharing the risk of production with the grower or producer. This type of program greatly reduces the waste involved in blindly growing food for an indeterminate number of people. According to the 2016 Canadian Census, it was reported that 165 Middlesex County based farms reported using farm gate sales, stands, kiosks and U-pick while 16 farms sold value-added products. A total of only 8 farms reported using Community Supported Agriculture (CSAs) to market their products.



Innovation

Innovation comes naturally to many operators in Middlesex County and the agriculture sector leads the way in the age of alternative energy and fuel technologies. Farmers have begun to embrace alternative technologies in their farming practices including solar, wind and bio-fuel crops. Working in collaboration with agencies - including the Cooperative Extension Service, Department of Agriculture, Soil Conservation Service, and Natural Resource & Conservation Service - farmers in Middlesex County are consistently kept on the forefront of using new technology.



Number of Farms Involved in Using Technological Advancements in Middlesex County (2016):

Technological Advancements	Number of Farms Using Technology
Computers/laptops for farm management	1399
Smartphones/tablets for farm management	996
GPS technology	948
Automated steering (auto-steer)	472
GIS mapping (e.g., soil mapping)	339
Automated animal feeding	175
Automated environmental controls for animal housing	164
Greenhouse automation	13
Robotic milking	8
Other technologies	7

Renewable Energy Production

The use of renewable energy production including, but not limited to, solar panels and wind turbines was recorded in Middlesex County on 245 farm; with 188 farms using solar panels and 66 farms using wind turbines.

Raising Awareness

Middlesex County's Economic Development Department will be utilising the information regarding the agricultural sector to raise awareness among citizens, businesses, visitors and investors.

This information has been upload to our website at: <https://www.investinmiddlesex.ca/>

An infographic summary of this information is also available on the website and in print.