AGRI-LMI
LABOUR MARKET INFORMATION

How Labour Challenges Will Shape the Future of the 'Dairy' Industry:

Agriculture Forecast to 2029

Canada's agriculture sector faces unique labour market challenges in the coming years, and so will the 'dairy' industry. This report explores some of the workplace trends and realities that will shape this industry between now and 2029.

Industry Overview

The 'dairy'* industry is a significant agriculture employer, but a saturated domestic 'dairy' market and limited exposure to foreign markets will restrict the industry's growth over the next 10 years. A moderate production outlook means that a smaller labour force will be required. While some regions will have a surplus of workers, other will continue to find it challenging to meet production targets. As a result, the industry's labour gap is expected to shrink.

The 'dairy' industry includes operations that primarily engage in milking 'dairy' cattle. While the 'dairy' industry has shed around one third of its workers since 2007, it is still a significant agriculture employer, employing 32,200 workers, or 9% of the total agricultural labour force, as of 2017. Canada's 'dairy' industry is geographically concentrated, with Ontario and Quebec accounting for just under four-fifths of the industry's workforce.

The market for the industry's product is primarily domestic, with limited exposure to foreign markets. Market saturation will limit growth for the industry, which in turn will reduce the demand for labour over the next decade. However, the labour supply is also predicted to shrink during that time, which means that 'dairy' producers in some regions will still face challenges in finding enough workers.

Unlike industries with more seasonally dependent products, the 'dairy' industry has a consistent need for workers throughout all seasons. As a result, the industry is predominantly made up of domestic workers, with foreign workers accounting for only 1.6% of the workforce. This is below the average of 17% across the entire agriculture sector, and far below industries such as 'tree fruit and vine' or 'field fruit and vegetables' at 52% and 43%, respectively.

*The Labour Market Information data classifies Canada's agriculture sector into 11 commodity areas: 1) 'apiculture'; 2) 'aquaculture'; 3) 'beef'; 4) 'dairy'; 5) 'field fruit and vegetable'; 6) 'grain and oilseed'; 7) 'greenhouse, nursery, and floriculture'; 8) 'poultry and egg'; 9) 'sheep and goat'; 10) 'swine'; and 11) 'tree fruit and vine'.

'Dairy' industry at a glance

In 2017:
- 32,200 people employed
- 1,200 jobs left unfilled
- 148 million in lost sales due to labour shortages

In 2029:
- 3,000 fewer domestic workers available
- 34% of the workforce lost to retirement
- 1,000 more jobs than the domestic workforce can fill

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Production Trends

The 'dairy' industry has had healthy growth in recent years, but its output will continue to be limited by a saturated market. This trend, along with productivity gains, will reduce the number of workers the industry requires.

A trend towards industry consolidation has reduced the number of 'dairy' farms by more than half since 1997.

The industry has seen robust gains in productivity, which have provided a boost to industry output. Since 2007, industry output has enjoyed average annual gains of 1.7%. However, this production growth has been slow relative to that of the overall agriculture sector. This reflects the limited market demand for 'dairy' products. Canada's 'dairy' output is largely confined to the domestic market, and per capita demand for 'dairy' products has been gradually falling across the country.

These trends towards improved farm productivity and limited market demand for 'dairy' products have resulted in a decline in the number of workers needed to service the industry. Since 2007, labour demand in the 'dairy' industry has declined by an average of 2.9% per year.
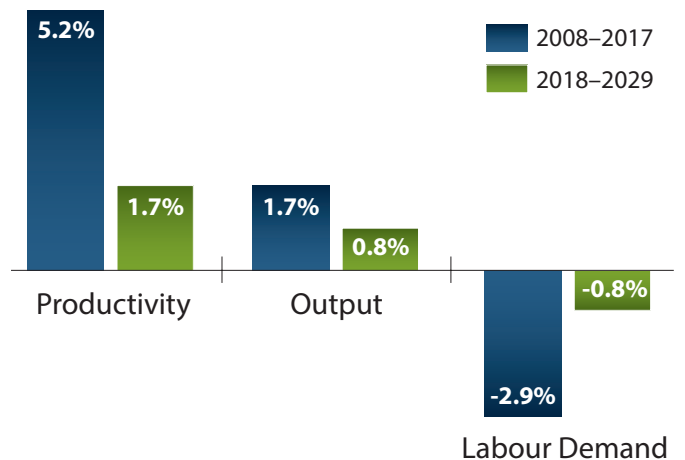
This downward trend is expected to continue over the next decade. A saturated domestic market for 'dairy' products is expected to limit gains in the industry's production to 0.8% per year, the weakest outlook in the agriculture sector. Between 2018 and 2029, the combination of a stable production outlook and continued gains in output per worker will result a decline in the number of industry workers needed, by an average of 0.8% per year.

RESEARCH HIGHLIGHTS

- **42%** of 'dairy' producers were not able to find all the workers they needed in 2018, compared to 47% for all agriculture.
- **35%** of 'dairy' producers expect employment at their farm to rise over the next five years, while 19% expect to see a decline.

Productivity, Output, and Labour Demand Trends
(average annual percentage change)

	Productivity	Output	Labour Demand
2008–2017	5.2%	1.7%	-2.9%
2018–2029	1.7%	0.8%	-0.8%

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Labour Forecast

While agriculture faces significant labour challenges over the next decade, 'dairy' producers are forecast to have the most balanced labour market of any industry within the sector.

Over the forecast period, the number of workers required by the 'dairy' industry is expected to fall from 33,400 in 2017 to 30,200, a decline of 0.8% per year.

During the same time, the domestic supply of labour is also expected to fall from 32,200 workers to 29,200. As a result, the number of 'dairy'-farm jobs that can't be filled by the domestic labour supply is expected to shrink to 1,000 by 2029.

In other words, to reach its production potential in 2029, the industry will need to find 1,000 more workers than will be domestically available. Despite the challenges that this presents, 'dairy' producers have the most balanced labour market forecast of any industry within the agriculture sector. As a point of comparison, the 'dairy' industry is looking at a labour gap equivalent to 3% of the total demand for workers, while the labour gap of the overall agriculture sector is predicted to reach 32%.

## The Labour Gap Moderates for the 'Dairy' Industry
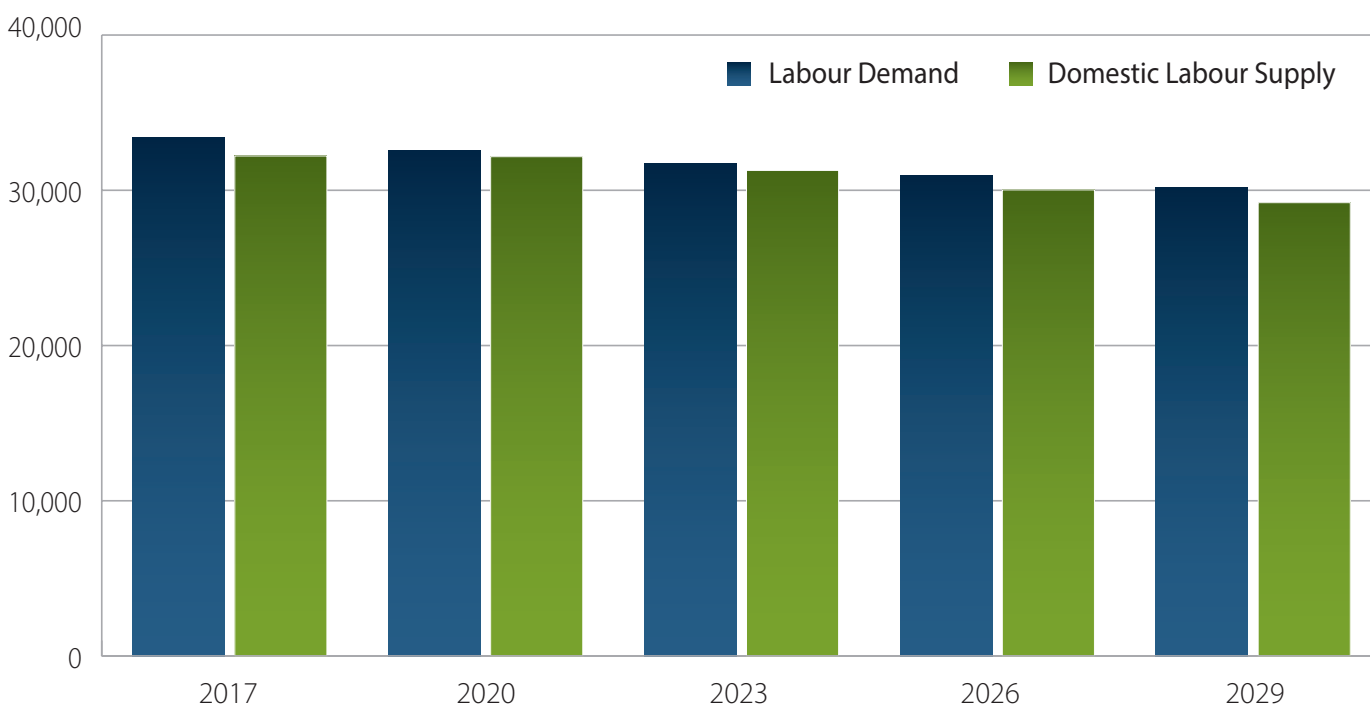
Regional Trends

While the labour market forecast for the 'dairy' industry as a whole is comparatively stable, the number of available workers will vary widely from region to region.

There will be considerable variation among the provinces. For example, by 2029, Ontario will need 660 more workers than are available in that province, a number equivalent to 7% of the total labour force needed by the province's 'dairy' industry. Alberta and Saskatchewan will also experience a labour shortage equivalent to 14% of the total labour force needed in this region. At the opposite end of the spectrum, Prince Edward Island, which accounted for roughly 1% of all 'dairy' workers in 2017, will have a labour surplus of 260 workers in 2029.

Quebec, the industry's largest employer, will have a balanced labour market, requiring 330 more workers than are available in that province. This number is equivalent to 2% of the total labour force needed by the province's 'dairy' industry.

Number of Industry Jobs at Risk by 2029

Other
14

Quebec
330

Ontario
660
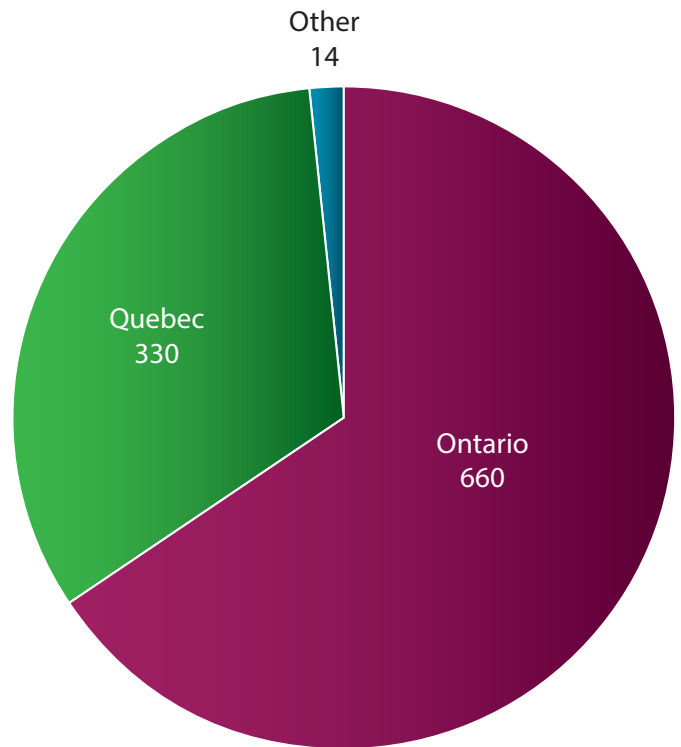
Demographic Trends

The 'dairy' industry's domestic labour supply has already fallen significantly in recent years, as a result of a pickup in retirements. This trend is expected to continue into 2029, however, with many retirements having already materialized, the industry will be less heavily impacted by retirement over the coming decade. Over one-third of the current workforce (34%) is expected to retire over the forecast period, which is the lowest share among agriculture industries. In comparison, 37% of the entire agriculture workforce will retire by 2029.
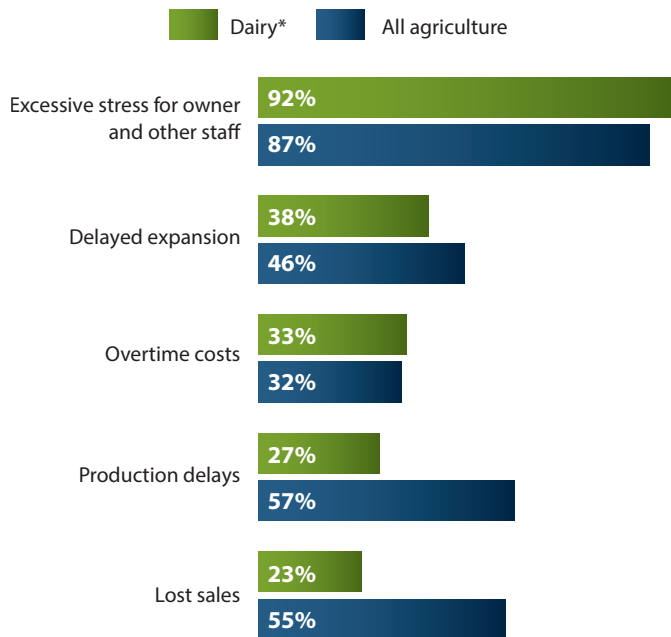
Financial Impact

While the 'dairy' industry is less affected by labour shortages than other agriculture industries, a lack of workers still affects the industry's profitability and ability to grow.

In 2017, the 'dairy' industry was unable to fill 1,200 jobs. This number was equivalent to 3.8% of the total number of workers required, which is below the average of 5.4% for the entire agriculture sector.

Survey respondents from the 'dairy' industry reported a number of issues caused by labour shortages. Of 'dairy' producers who reported labour shortages, over nine in ten respondents (92%) reported excessive stress for owner and other staff, compared to just 87% of respondents across the sector. The second most common issue was delayed expansion, with 38% of respondents reporting that they put off expansion plans due to insufficient labour.

Lost sales are less common, with 23% of respondents affected. As a result, labour shortages are estimated to have cost the 'dairy' industry 2.2% of sales in 2018, which is a relatively small share of sales compared to those reported by other agriculture industries. Only the 'poultry and egg' industry experienced a smaller percentage of lost sales due to labour shortages. However, this still represents $148 million in losses for the 'dairy' industry.

Impacts of Labour Shortages

Legend: Dairy* , All agriculture

Impact	Dairy*	All agriculture
Excessive stress for owner and other staff	92%	87%
Delayed expansion	38%	46%
Overtime costs	33%	32%
Production delays	27%	57%
Lost sales	23%	55%

*Based on responses of 48 dairy producers who reported not having access to all needed workers.

Labour Challenges

While the 'dairy' industry is less vulnerable to some of the common labour issues affecting other agriculture industries, finding qualified workers is a key recruitment challenge.

Many industries in the agriculture sector have difficulty in finding and retaining workers, but the 'dairy' industry faces several unique challenges, including long work hours, insufficient compensation relative to other sectors, and a lack of experienced, qualified workers.
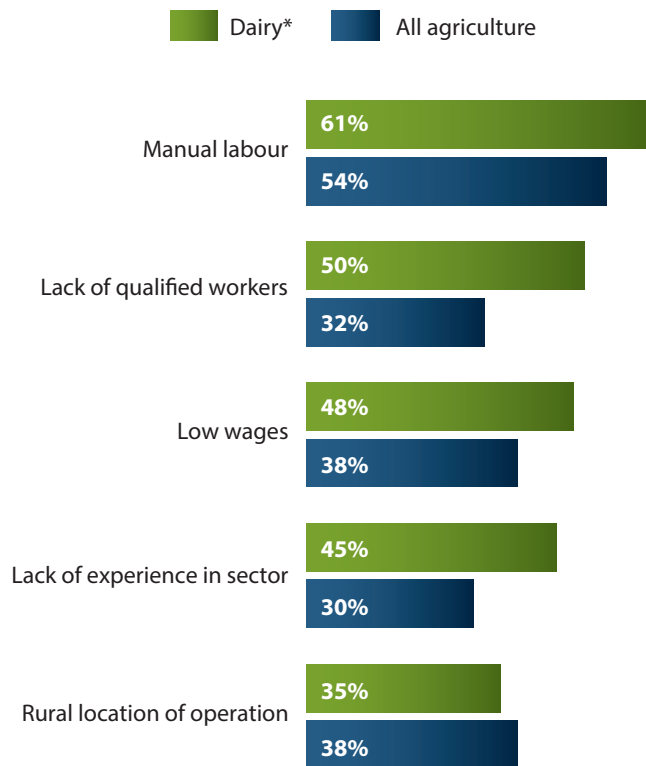
However, the industry also benefits from several advantages, including less seasonality and operations in less remote locations, which makes the industry more attractive to workers.

Recruiting Workers

'Dairy' employers are affected by many of the same recruitment issues facing the sector across the country. However, the industry is unique in a few ways. For example, 'dairy' producers face greater difficulties finding qualified workers. Half of 'dairy' respondents cited a lack of qualified workers represented a barrier to recruitment, which is the highest share among agricultural industries. At the same time, 'dairy' producers were more challenged by a lack of understanding about agriculture, with 29% identifying it as a barrier to recruitment, compared to only 20% of employers across agricultural industries.

On a positive note, 'dairy' producers were less likely to report seasonality as a barrier to recruitment. Specifically, fewer than one in five (17%) survey respondents from the 'dairy' industry suggested that the seasonal nature of work didn't interest applicants, compared to 43% of producers industry wide.

Challenges in Recruiting Workers

Legend: Dairy* | All agriculture

Challenge	Dairy*	All agriculture
Manual labour	61%	54%
Lack of qualified workers	50%	32%
Low wages	48%	38%
Lack of experience in sector	45%	30%
Rural location of operation	35%	38%

*Based on responses of 143 dairy producers.

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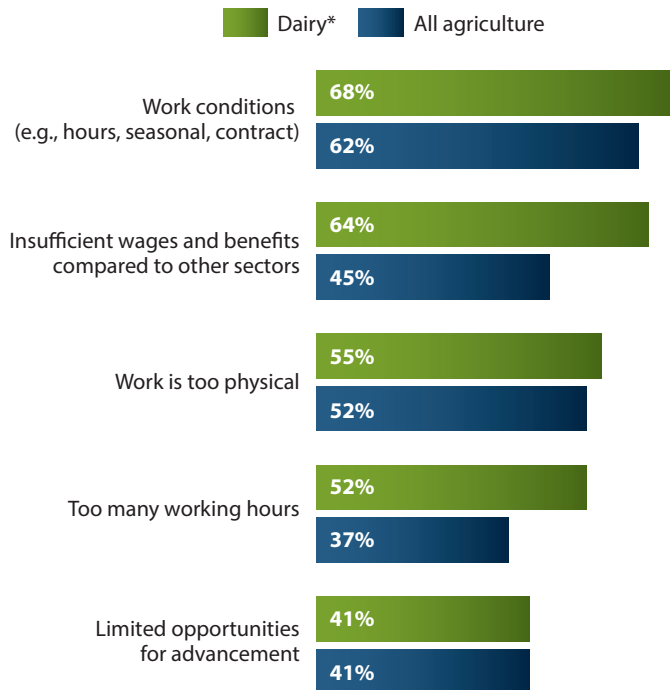Agriculture Forecast to 2029

Retaining Workers

'Dairy' producers are much less challenged in retaining workers. The industry not only has the lowest involuntary turnover rate among agricultural industries of 0.2% (compared to the national average of 2.5%), it also boasts the lowest voluntary turnover rate of 1.3%, compared to the national average of 10.3%.

Insufficient compensation relative to other sectors is one of the industry's biggest retention challenges, with over three in five (64%) 'dairy' producers citing it as a barrier to retention, compared to 45% of producers across agricultural industries. Long working hours is another important issue for 52% of 'dairy' producers. This is the highest share among agricultural industries.

The remoteness of operations poses less of a challenge for this industry than for others in agriculture. At the same time, only 14% of 'dairy' industry producers reported that variability in hours challenged their retention efforts, compared to 24% of all agricultural employers.

Challenges in Retaining Workers

Legend: ■ Dairy* ■ All agriculture

Work conditions (e.g., hours, seasonal, contract)
- Dairy*: 68%
- All agriculture: 62%

Insufficient wages and benefits compared to other sectors
- Dairy*: 64%
- All agriculture: 45%

Work is too physical
- Dairy*: 55%
- All agriculture: 52%

Too many working hours
- Dairy*: 52%
- All agriculture: 37%

Limited opportunities for advancement
- Dairy*: 41%
- All agriculture: 41%

*Based on responses of 142 dairy producers.

Toughest Jobs to Fill

The 'dairy' industry will have the most trouble filling managers in agriculture jobs, including owner-operators and employed farm managers. This occupational category, which accounts for 58% of the industry's current workforce, is expected to account for almost all the labour gap by 2029.

While all other jobs in 'dairy', including specialized livestock workers, general farm workers, and all other occupations, are expected to have a surplus of workers available by 2029, 1,500 managers in agriculture jobs are predicted to go unfilled due to a lack of qualified domestic workers.

Conclusion

The labour gap is closing for the 'dairy' industry, making it one of the most balanced labour markets in the agriculture sector. But it still faces labour challenges in the decade ahead.

While the 'dairy' industry's domestic labour supply will shrink in the coming years, a combination of limited exposure to growing foreign markets, stagnant domestic demand, and continued healthy productivity gains means that demand for labour will fall marginally faster.

As a result, the industry's labour gap will shrink to 1,000 workers by 2029, equivalent to only 3% of demand, and the 'dairy' industry will have the most balanced labour market in the agriculture sector. The industry also benefits from low seasonality and lower-than-average turnover and retirement rates.

However, the industry will still face labour challenges:

➜ Long hours on the job and the associated overtime costs could make it difficult for employers to retain workers and manage labour costs.

➜ People with the right skills and experience will remain in short supply, with more formal training potentially required to address the issue.

➜ Regional variability in the labour force suggests that significant labour shortages will affect certain provinces, particularly Alberta, and Saskatchewan.

Overcoming these labour challenges will ensure that the 'dairy' industry, one of agriculture's most significant employers, will continue to thrive in the years to come.

About This Report

This report represents an update to the Labour Market Information (LMI) study that the Canadian Agricultural Human Resource Council (CAHRC) undertook between 2014 and 2016. The purpose is to re-assess the labour market, project supply and demand for agricultural workers from 2018 until 2029, and recommend potential solutions to labour issues.

The Conference Board of Canada, commissioned by CAHRC, constructed an economic model that forecasts agricultural labour demand and supply for each province, for 11 different commodity groups, and for 25 occupational groups.

The economic model was validated through several industry consultation activities conducted Canada-wide, including:
- **A large-scale survey** of 1,316 employers, 278 workers, and 110 industry stakeholders.
- **Eight webinars** focused on specific commodity groups, with 160 participants in total.
- An Advisory Group presentation.

This data was used to produce the following reports:

Commodity-specific reports and fact sheets
Apiculture ■ Aquaculture ■ Beef ■ Dairy ■ Field Fruit and Vegetable ■ Grain and Oilseed ■ Greenhouse, Nursery, and Floriculture ■ Poultry and Egg ■ Sheep and Goat ■ Swine ■ Tree Fruit and Vine

Regional reports and fact sheets
National ■ British Columbia ■ Alberta ■ Saskatchewan ■ Manitoba ■ Ontario ■ Quebec ■ New Brunswick ■ Prince Edward Island ■ Nova Scotia ■ Newfoundland and Labrador

For more information on the research, and to access additional commodity-specific, national, and provincial reports, please visit the CAHRC website at www.AgriLMI.ca.

About CAHRC

The Canadian Agricultural Human Resources Council (CAHRC) is a national, nonprofit organization focused on addressing human resource issues faced by agricultural businesses across Canada. CAHRC conducts industry research and develops products and services designed to help agricultural employers attract, retain, and develop the workforce they need to succeed.

For more information about the Council and its products and services for Canada's agriculture sector, please visit www.cahrc-ccrha.ca.

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Acknowledgements

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