# Traceability in Finnish Food Chain with focus on milk and meat production

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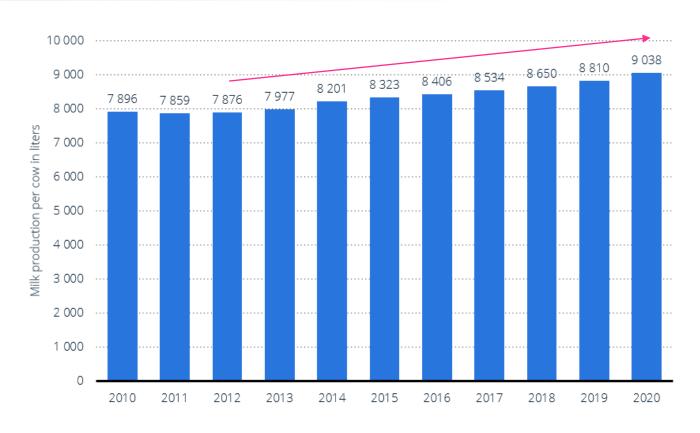
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### Finnish milk consumption

In Finland milk consumption per person is the <u>largest in the world</u>.

Milk production is the most important source of livelihood in the rural areas, maintaining population and vitality of the rural areas.



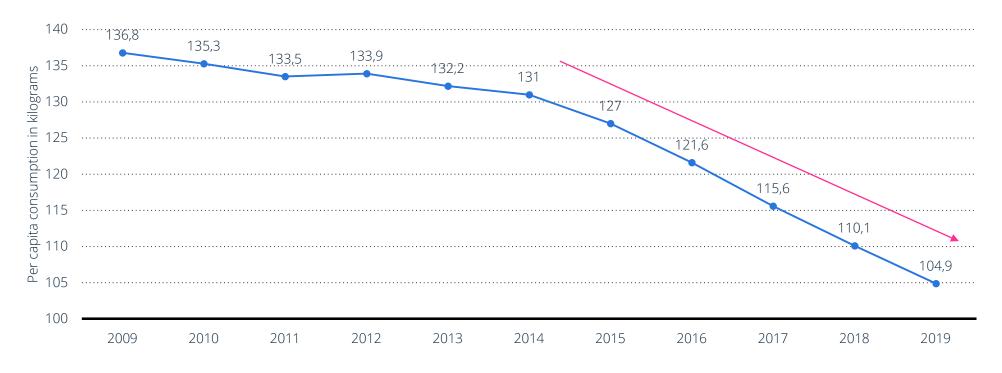
In 2020, the average milk yield per cow amounted to approximately 9,038 liters. Starting from 2012, the average milk production volume per cow increased steadily each year.

Source(s): Natural Resources Institute Finland; ID 896654

### **SAVONIA** Finnish milk consumption

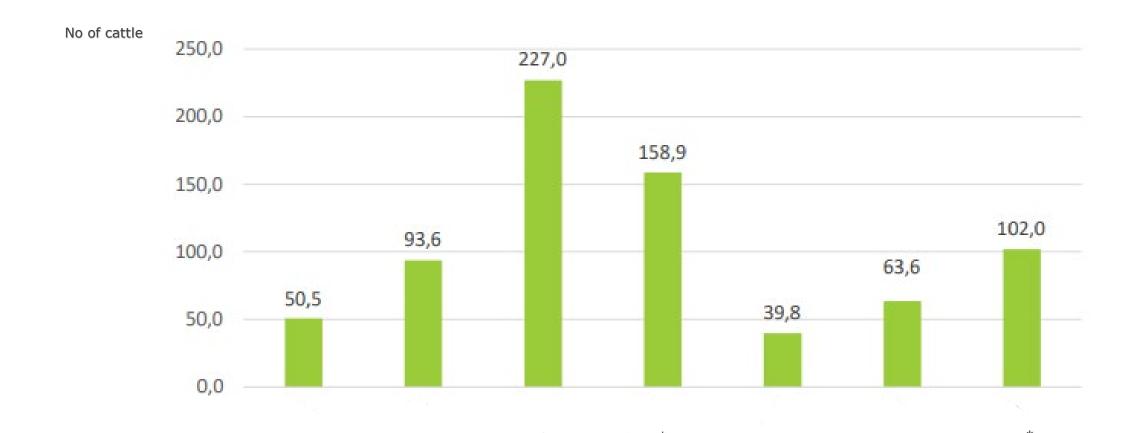
In the period from 2009 to 2019, milk consumption in Finland declined over 30 kg per capita.

In 2019, consumption of milk amounted to 104.9 kilograms per capita, which was roughly 5 kg less than in the previous year.



Source(s): Natural Resources Institute Finland; ID 460031

### Cattle size in different countries 2020



Source(s): Maidontuotannon tulosseminaari 18.3.2021/ Nokka



### The quality chain

### From dairy farm to final products



We produce our milk at family farms, where the farmers know individual animals, even by name.

Leading milk processor Valio (over 80% of market share) sources milk from the farms of its owner-entrepreneurs.

Our milk products are clean, the food supply chain is traceable from the farm to the dining table, and the Valio brand stays with the product from start to finish.

### Milk production is our strength

Milk production methods as well as smaller farms compared to competing regions and individual animal care are among Finland's strengths.

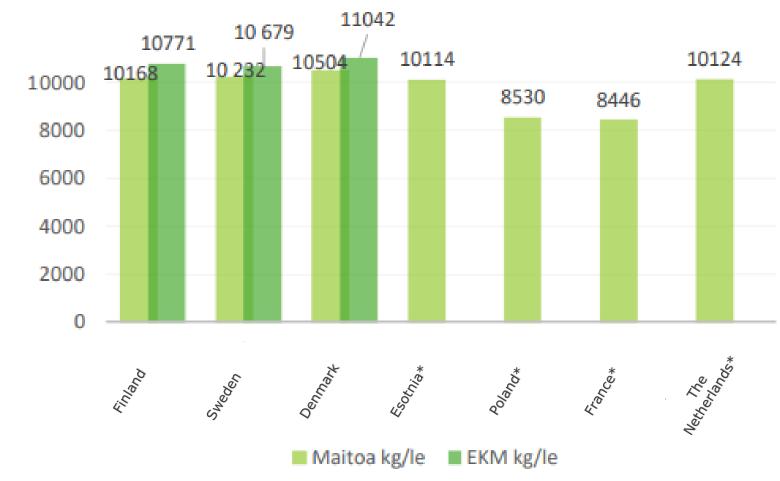
We make time to observe our animals, and we don't medicate them without cause. Our ability to handle the GMO issue is better compared to others, as typical cow feeding in Finland is based on grass feed. Feed makers are actively involved in the supply chain, and have, for example, committed to the list of positive.

We produce high-quality milk all year round, with no compromise due to seasonal demands or weather conditions.

### Milk production is our strength

EKM -tuotos 2020

SWE 10 417 kg 10 771 kg FIN 11 042 kg DK



Source(s): Maidontuotannon tulosseminaari 18.3.2021/ Nokka

### **SAVONIA** Finnish milk goes digital

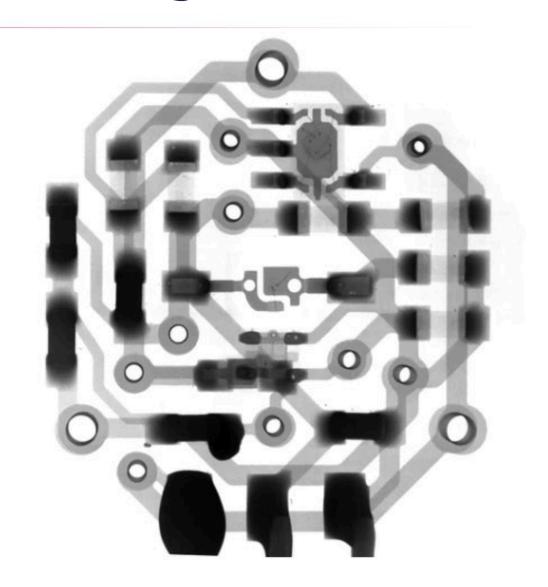
Finnish dairy is putting in a lot of effort to digitalize the journey of their milk from farms to store shelves.

It starts off with addressing the core questions:

WHY?

WHAT?

and HOW?



Source(s): picture from unsplash.com

### **SAVONIA** Finnish milk goes digital

The milk's digital journey begins with the cow, which wears sensors. This enables full monitoring of the individual cow in terms of milk production, right amount of feed rationed as well as right timing of the gestation.

The digitalization is gaining ground at a rapid pace as the number of dairy farms has continually reduced, while the size of farms has increased.

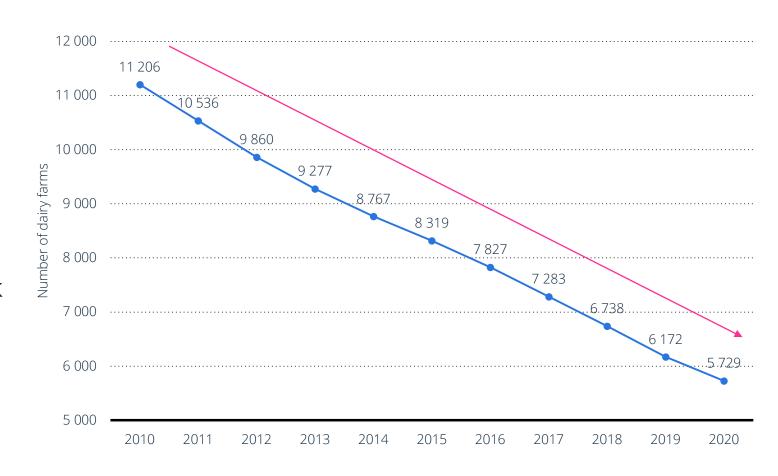
The milk trucks are full of digital technology, allowing the farms to monitor the location of their trucks and have the data transferred in real time between the trucks and the dairy laboratories.



## **SAVONIA** Dairy farms in Finland

The number of dairy farms in Finland steadily decreased throughout the period from 2010 to 2020.

Within 10 years the number of Finnish diary farms producing milk shrank by nearly 50%.



Source(s): Natural Resources Institute Finland; ID 898161



### **SAVONIA** Beef production in Finland

Milk production is closely connected to beef production, as more than 85 % of Finnish beef is produced as a by-product of milk production.

Male calves of dairy cows are raised for beef production and dairy cows that have ended their production are also slaughtered for beef.

Beef production is studied in a comprehensive manner, including feed production as animal feeding being equally mindful of potential environmental effects caused by it.

### **SAVONIA** Beef production in Finland

On-going climate change emphasis importance of plant breeding and variety tests have a considerable role among annually accomplished field trials.

Animal welfare state is verified by video recording and utilizing appropriate sensor techniques. Obtained results are utilized in construction of beef production model developed for Finnish beef farm conditions.





https://www.youtube.com/watch?v=88tvUKpMDSA

https://agrifoodclusterns.fi/