



La Revue

December 2023

Holstein Québec

Human-cattle relationship

Understanding without speaking

Ferme Maxi 2009 inc.

Transition to 3 milkings per day

Freiland Holstein

Leave nothing to chance



Freiland Holstein

Leave nothing to chance

More than thirty years ago, a Swiss-German couple arrived in Quebec who had just left their farm in the canton of Appenzell to their family, with the aim of perpetuating their dream of having a dairy business capable of expansion. In Saint-Sylvère, in Central Québec, they purchased Ferme Plourdoise: the 40 cows and their heifers, the machinery, the 33 kg of quota, the 350 acres of land and woodland as well as the buildings that found there. This was the beginning of their adventure on Canadian soil.



By
Geneviève
Drolet, agr.
Editor

Freiland Holstein (Frohland)

OWNERS

Andréas Fitze and
Myriam Rivard

HERD

430 head, including 170
lactating cows

PRODUCTION

12 960 kg of milk, with 4,1 %
fat et 3,3 % protein

BCA : 289-315-303

QUOTA

230 kg BF/day

CLASSIFICATION

15 EX – 95 VG – 58 GP

CROPS

850 acres (hay, corn silage,
corn, cereals, soybeans)

From then on, Hansueli Fitze and Cécilia Zoller created Ferme Freiland, reminding them of the name of the mountain very close to where they came from in Switzerland. About ten years later, in 2003, their son Andréas joined the company with 30% of the shares and the trio made the decision to modify the buildings to build a free stall with at least 120 places for the lactating cows. Already, they believe that this type of building represents the future of dairy production. They then own 82 kg of quota and 620 acres of land and woodland.

In order to fill their new barn, they then purchased 40 kg of quota as well as several cows. To do this, Andréas went to Comestar Holstein



to find cows. Among them, *Comestar Lautama Goldwyn*, VG-88 22*, is undoubtedly the one which will have the most repercussions for the herd.

Comestar Lautama Goldwyn, VG-88 22*

6-4 18 069 kg 4,8 % F 3,2 % P 345-441-348

- Classification of VG-87 at 2 year-old
- 2 Superior Lactations
- Laurie Sheik family
- Several bulls in AI
- Her daughter: *Frohland Lautastella Snowman*, EX 3E 3*, is the winner of the Hermas-Lajoie provincial trophy for her production at 4 years old

Rolling up your sleeves after a fire

Unfortunately, in May 2008, a fire destroyed all the buildings and silos, in addition to the heifers and twenty cows. Out of emotion the next day, the construction of the new barn began. With a slightly different layout, they build a replica of what they had. A huge amount of work by everyone led to the first milking in the new farm just seven months later.

To make up for the lack of cows lost in the fire, the Fitzes returned to Comestar Holstein. They selected individuals from the best families in the herd. Even today, they farm cows from purchases made at this occasion, such as *Comestar Lausingail Goldwyn*, VG-87. Andréas appreciates, among other things, this branch for everything it transmits in terms of production, conformation and its genetic index. *Frohland Lausindra Doc*, VG-87 2 years old, is the most promising descendant at the moment on the farm with her three Superior Lactations in three calvings.

On the bull side, Andréas appreciates safe values. To avoid being disappointed, he is very rigorous in his selection criteria. Bulls must have at least 11 points in conformation, be milk positive and have more than 80 kg of fat. He prefers to buy more doses and few different bulls. *Farnear Delta-Lambda* is his current favorite. He has more than 45 daughters in the herd currently and he plans to do more. "Lambda's milking daughters are strong in production, they have superb udder quality and good legs" adds Andréas. "I like them because they are uniform. We have, among other things, a beautiful *Lambda* from *Jellybean* which produces a lot of fat"

Belcher Goldchip Jellybean, EX-95 3E

5-3 21 855 kg of milk, 3,5 % F et 3,2 % P (404-384-415)

- 2 Superiors Lactations
- Lifetime production in 6 lactations : 97 720 kg of milk
- Grand Champion at Expo de la MRC de Bécancour in 2018 and 2019
- 1st five year-old at the Quebec Spring show in 2019
- Daughters 100 % GP and better





Since 2015, the cold barn for calves houses ten hutches on one side and on the other, it is divided into six pens that can accommodate ten calves per pen. Myriam uses a milk taxi to feed them.

To have fun

To keep the passion, Andreas enjoys participating in sales and buy animals from popular cow families like *Jacobs Goldwyn Britany*, EX-96 2E 32*. Currently, the Rivard-Fitze couple raises animals from 15 to 20 different families. “In winter, Andréas’ favorite pastime is choosing embryo donors with whom to carry out in vitro fertilization. Here, unlike others, in vitro calves are healthier!” points out Myriam.

After having set up a business to their liking, Myriam and Andréas now plan to integrate their successors in the near future. Their four children follow in their footsteps both on the farm and on the show grounds. We bet they will have fun with such a great business!



Myriam Rivard and Andréas Fitze are passionate about exhibitions. Their four children, Mathias, Catherine, Eliane and Léa also love life on the show grounds.



Photo credit: Mickaël Rheault



Over time...

- 1991**
Purchase of the farm in Saint-Sylvere
- 1999**
Construction of a free stall for replacement animals
- 2003**
Construction of a free stall for 120 cows, with milking parlor
- 2005**
Purchase of 40 kg of quota
- 2008**
Fire causing the total loss of buildings, silos and 70 animals (May)
- 2008**
Construction of buildings and start of operations (December)
- 2010**
Construction of the houses of Hansueli and Cecilia, as well as Andréas and Myriam
- 2013**
Transfer of the farm to Andréas and Myriam
- 2015**
Construction of a barn for calves and a garage
- 2019**
Expansion of the free stall for 250 places

“ We bet they will have fun with such a great business! ”



Frohland Jordan Bara, EX 3E 1*

- 1 Super 5
- Lifetime production in 5 lactations : 106 657 kg of milk, 4,8 % F, 3,3 % P
- Reserve Grand Champion at Expo de la MRC de Bécancour 2010
- Her mother bought from a herd dispersal: *Destours Jaromir Bea*, VG-86 4*, was Canadian Champion for milk in 2004. She produced 128,086 kg of milk for her lifetime.
- His granddaughter classified EX-94 5E, *Frohland Betsy Wild Beast* has 1 Super 3 and a lifetime production of 107,606 kg of milk.
- Family that combines longevity and production

Ferme Maxi 2009 inc.

Successful transition to three milkings per day

In November 2020, Philippe Lefebvre, co-owner of Ferme Maxi 2009 inc. in Saint-Elphège, breaks a finger. His injury, which would not heal, forced him to take some physical rest. It was the time he needed to think about the future of his farm. Wanting to do more with what he already had, he decided, supported by his father Mario, to try a schedule of three milkings per day. Decision he will not regret.

Ferme Maxi 2009 inc. (Maxile)

OWNERS Mario and Philippe Lefebvre	QUOTA 157 kg BF/day
HERD 210 head including 100 lactating cows	CLASSIFICATION 17 M. EX – 2 EX – 60 VG – 34 GP
PRODUCTION 14 081 kg of milk with 3,9 % fat and 3,3 % protein	CROPS 285 acres (hay, corn silage, corn, soybean)
BCA : 317-330-325	

While the initial objective was to be able to produce 1.6 kg of fat per cow per day, Philippe mentions that the initial 1.4 kg quickly transformed into the 1.83 kg that his cows currently produce. In order to support his herd which now consumes a little more dry matter, the cows receive a single balanced TMR for the entire herd. Only cows producing 55 kg of milk or more are supplemented. The increase in production brought about by the third daily milking allowed them to produce 30 kg of additional quota per day with the same herd. Philippe mentions another advantage he noticed with this new schedule: "Since the first milking starts at 5:30 a.m. and the last one finishes at 10:30 p.m., there is someone in the barn at all times, 17 hours a day, to observe, care for, clean, etc. The animals are rarely left to their own devices."

Secrets of success

On the genetics side, Mario and Philippe have been working with the same cow families for 20 years. These families have proven to them that they can last over time by evolving over the years. "For us, they are a guarantee of stability. Moreover, we are proud to have passed the 10 multiple Excellent mark last February and to now be at 17."

The Lefebvres don't hide it... they love chatter! Curious by nature, they are always willing to visit other farms, they even make it a duty. Having themselves been hosts during the open house of the 2015 Holstein Quebec Convention, they remember the impressive number of visitors that day and they do not hesitate to return the favor during this type of event. Several visitors also came back to see them to buy cows afterwards. Despite all the work done previously, this day had opened up a huge market for them.



By
Geneviève
Drolet, agr.
Editor



La Ferme Maxi 2009 inc. was one of the host farms during the open days of the 2015 Holstein Quebec Convention.

"K" family

Brood cow: *Elvenhome Storm Katt, EX 3**

The largest family in the herd, they combine conformation and high production in addition to having formidable health.

Among his best descendants:

- *Maxile Sanchez Kattez, VG-88 3** - Production in 5 lactations: 70,328 kg of milk.
- And her daughters:
 - *Maxile Brewmaster Kattazou, EX-92 2E*, has a Superior Lactation. She produced at 6 years old: 18,149 kg of milk with 4.1% fat and 3.3% protein (330-366-347)
 - *Maxile Mogul Kattezie, EX 2E* – Projection : 18,093 kg 3.8% fat and 3.1% protein (339-349-339)
 - *Maxile Dempsey Kattrinette, VG-88 4**, having produced 75,994 kg of milk for life including a Superior Lactation.
 - And her daughter: *Maxile Airlift Kriek, EX-92 3E 2** who has two Superiors Lactations and a lifetime production of 90,109 kg.



Maxile Brewmaster Kattazou, EX-92 2E has a VG-86 daughter by Mirand who is projected at 3 years: 14,705 kg 3.8% fat and 3.3% protein (330-336-337)

« V » family

Brood cow : Clairbois Tab Vionnie, VG 5*

- *Backed by: Clairbois Violy Matt, EX 15**, then two VG.
- *Maxile Jolt Violetta, VG-87 5** - Lifetime production: 63,599 kg of milk with 4.4% fat and 3.4% protein.
- *Maxile Iron Virole, VG 4**, has three daughters, all Excellent.
- *Maxile Sanchez Violy, EX 3E* - Lifetime production: 61,074 kg of milk with 4.5% fat and 3.6% protein.
- *Maxile Atwood Viata, EX-91 4E* – Lifetime production: 70,027 kg of milk with 4.7% fat and 3.7% protein.
- *Maxile Maui Vitamaster, VG-86* – Projection: 16,535 kg of milk at 3.9% fat and 3.3% protein.



Maxile Dempsey Vionneige, EX-91 3E and Maxile Dempsey Viol, EX 4E won the Progeny of dam class of the Centre du Québec Holstein Club Breeders' Cup in 2018. They did honor to their mother, Maxile Iron Virole, VG 4.*

For them, visiting other dairy businesses allows them to get ideas to improve and learn from those who have good techniques. They then have the opportunity to see with their own eyes what works well for others and think about how they can then find the recipe that works well for them. "It's also an opportunity to take some time off and observe other people's beautiful 2-year-olds! » adds Philippe. With their travel companion, Claude Lanoie, they made several escapades in eastern Ontario and even in the United States. One of their red heifers was, among other things, the reason for a return trip to the New York Spring Show in Syracuse (US). *Maxile Rubens Romance* caught the eye of Donald Dubois during a visit to the farm. He then offered the Lefebvres to consign her to the National Sale. In order to increase the visibility of the heifer, he suggested that they exhibit her in one of the only spring R&B shows at the time, in Syracuse. Against all expectations, she won the junior championship! She was then sold to Larry Mohrfeld in Ohio who showed her three times in Madison with top four results each time.

A tool that Philippe has integrated more recently is the CowManager. Since milking has mainly been done by foreign workers since 2019, this animal body temperature sensor greatly helps Philippe in his daily observations. The transmitter is placed on cows preparing for calving until pregnancy is confirmed. Since he also used it with open heifers, the age at first calving has improved by three months.

Breeders' Cup

Having already prepared animals for shows when he was younger, Philippe participated in the Centre du Québec Holstein Club Breeders' Cup from the first year. Since its creation in 2018, he has not missed one. Being a little nostalgic for the shows, a few days before the judge's visit, "I take out my little blades and I have fun" says Philippe with a laugh. He loves the challenge of selecting his best cow for each category, welcoming the team to the farm and, of course, the resulting social activity at the awards ceremony. La Ferme Maxi 2009 inc. even won the Breeder's Banner (tied) in 2019.

Through Mario's mandate as mayor of Saint-Elphège and Philippe's family life with his wife and three children, the father-son duo likes to set goals and then discuss, exchange, read and find ways to achieve them. Through the ambition to become Master Breeder, the construction of a new house, including the possible extension of the cow barn and the complete transfer of shares to Philippe, it is certain that they will be very busy for a few more years!



Mario, Philippe, Loïc and Éliane Lefebvre surround *Maxile Dempsey Amie, EX-93 5E*.

Photo credit : Brigitte Lapierre, Dlf pickseed

"A" family

Brood cow : Dubosson Amande Prelude, VG 4*

- *Amande* produced 101,051 kg of milk for life at 4.5% fat and 3.6% protein
- *Maxile Lheros Avalanche, VG-86*
- *Maxile Sanchez Avoine, EX 2** - 3-0 13,152 kg at 3.9% fat and 3.3% protein (282-297-289)
- *Maxile Dempsey Amie, EX-93 5E* – Lifetime production: 86,956 kg of milk with 4.4% fat and 3.6% protein.
- Several descendants of the family by *McCutchen* and *Mogul* including *Maxile Mogul Avoinette, VG-87*, who produced at 3 years, 17,588 kg of milk at 4.0% fat and 3.3% protein (390-425- 405)

Over time...



1987

Purchase of Mario's father's farm – 14 kg of BF/day

Mario also trades and transports animals.

1995

No more animal trade

1996

Replacement of crossbreeds with thoroughbreds

2001

Construction of a tie stall barn, a silo, a pit and purchase of 10 kg of quota

2004

Purchase of 19 kg of quota and rental of a barn to house the heifers

2005

Transfer of 50% of the company's shares to Philippe

2008

Construction of a building for the TMR

2013

Installation of an automatic milk feeder

2016

Expansion of the heifer and dry cow barn, in addition to the pit. Closure of the 2nd rental barn.

2022

Expansion of the food building

Ferme Fabel

Precision and rigour lead to high performance

It was in 2009 that Maxime Béliveau took over the reins of the family farm with his parents Catherine Fleurent and Sylvain Béliveau. Just like his grandfather at the time of the Raymonica prefix, his strong interest in breeding then motivated him to create the Fabel prefix, located in Grand-Saint-Esprit in Quebec central area. Thus were the beginnings in breeding of this young farmer, fresh from the benches of ITAQ, Saint-Hyacinthe campus and in love with a graduate in food processing, Lorianne Alix, who would become his wife, the mother of their four children and a daily ally in the company.

After several renovation projects of the tie-stall cow barn, in 2018, the construction of a new free-stall cold barn with natural light proved to be the best option to improve the well-being of lactating cows while being as affordable as possible. The co-owners' priority was to develop buildings where tasks could be done by a single person, including a woman. Robotic milking and composted litter on accumulation were therefore two options chosen. In addition to maximizing comfort, this choice limited the risk of animal injury. On the other hand, they do not minimize the challenges that this type of installation brings, that is to say the risk of freezing in winter and the management of humidity particularly during large variations in temperature outside.

The embryo transfer as well as the purchase of cows with both strong genetic index and a deep pedigree were carried out to accelerate the genetic progress of the herd. A good example is *Syma Iota Marie Lune*, VG-87 4*, purchased at the National Holstein Quebec Sale in co-ownership with Marc Leblanc of Ferme Antélimarck 2001 inc., a mentor who helped them a lot in their beginnings in breeding. Today, the herd has 26 descendants



By
Roxanne
Montplaisir, agr.
Advisory
Services Manager

Ferme Fabel (Fabel)

OWNERS

Maxime Béliveau and his parents, Catherine Fleurent and Sylvain Béliveau

HERD

170 head, including 90 lactating cows

PRODUCTION

12 500 kg of milk, 4,3 % fat, 3,3 % protein

QUOTA

140 kg BF/day

CLASSIFICATION

2 M. EX – 33 VG – 47 GP – 12 G

CROPS

810 acres

of *Marie Lune*, including a granddaughter projected at nearly 16,000 kg in 4th lactation who already has a Superior Lactation to her credit.

The Fabel herd's breeding vision is based on longevity, health and production, which is why they select the best bulls on the market in LPI, Pro\$ and even TPI and Net Merit. "I want cows with good genetic indexes and high production equipped with functional udders for robots." Although conformation is not their main criteria, they aim above all for functionality and therefore place a lot of importance on teats and heel depth.



The Béliveau family. From left to right, in the back, Sylvain and Maxime Béliveau. In the middle, Gabrielle Béliveau, Catherine Fleurent, Olivier Béliveau and Lorianne Alix. Ahead, Étodie and Zoé Béliveau.

Now that the herd is more homogeneous, they have stopped embryo transfers and mainly use sexed semen. They aim to reduce the generation interval by using 100 % sexed semen on its heifers and 25 % on its best cows. Rigorous, Maxime ensures that the selected bulls are also A2A2, but above all preceded by solid pedigrees. To monitor the performance of his numerous families and support him in his selection, Maxime created an Excel file where he constructs the family tree of each line and notes the production, classification, recognitions and highlights of each animal. In this file, we can admire the fruit of the work of these breeders with five promising descendants of *OCD Raeden Damien 37465-ET*, VG-86, which they greatly appreciate, because she has all the assets they are looking for in a cow: good teat positioning, excellent production, good persistence and it stands out in terms of health and fertility. There are also several subjects from the well-known lines of *Ammon-Peachey Shana*, VG-87 12*, and *Comestar Laurie Sheik*, VG-88 23*.

Since 2009, the expansion from 44 kg to 140 kg of quota achieved thanks to the increase in the average production from 8,000 kg to 12,500 kg of milk proves that combining good genetics with excellent management allows you to achieve your objectives. « If you love your animals and want the best for them, they give it back to you! » says Lorianne, convinced that the key to success is the passion for her animals. In fact, the Fabel herd maintains more than 50 % of cows in 3rd lactation and above. “Now we realize that it is possible to have longevity and high performance!” Maxime proudly mentions.

This young couple now enjoys seeing their children, aged seven to twelve, take an interest in agricultural life, while encouraging them to develop their own passion. They believe that you have to be able to “switch off” occasionally to keep this passion alive. Never far from their roles as determined dairy producers, it is with their heads always full of projects that they rush towards the future with the objective of profitability and efficiency of the farm. And who knows, maybe one day they will raise the Master Breeder shield?



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Lactating cows are housed on composted bedding in a cold barn with natural light.

Centre du Québec Holstein Club

A successful wedding!

One of the youngest clubs in Quebec and the first to have jumped into the club fusion project, the Centre du Québec Holstein Club was formed in 2008 with the Drummond and Nicolet-Yamaska Clubs. It currently has 308 members distributed mainly in the RCMs of Drummond, Nicolet-Yamaska and Bécancour.

When the fusion discussions began, some partnerships between the two clubs were already taking place such as bus trips. Since the same type of activities were carried out on both sides, the union happened rather easily. They gave themselves time to restart a new club at their own pace. «At the



beginning, the respective presidents remained in office, as did the two secretaries» recalls Hans Broenimann who was then president of the Nicolet-Yamaska Holstein Club. «Since the territory was large, we continued to organize an annual open house in Drummond and another in Nicolet-Yamaska. It was like that for a few years, then it was alternating. »

Today, we can say that the two clubs have had a successful wedding! Directors who join the club's board of directors bring dynamism and stay for several terms. The former secretary, Jean-Guy Roy was in office for more than 25 years while Hans Broenimann held the position of administrator for 32 years including 10 years as president. In addition, he is currently president of the Classic Sale, a sale founded in collaboration between 4 neighboring Holstein clubs: Centre du Québec, Bois-Francis, Richmond and Sherbrooke.



By
Geneviève
Drolet, agr.
Editor



According to the current president, Dave Tourigny, « we have great participation from administrators at each meeting. It makes for great discussions when the 12 administrators around the table express their opinions! » Last year,

Holstein Québec Picnic

- 1941 – Séminaire et École d'agriculture de Nicolet
- 1965 – Ferme Monicdale, Sainte-Monique-de-Nicolet



- 1976 – Ferme Micheret, Saint-Zéphirin – (Nicolet-Yamaska)
- 1989 – Whiteriver, Jacques Côté family – (Drummond)
- 2006 - Ferme Madystar, La Visitation – (Nicolet-Yamaska)



Who will be the first farm from the Centre du Québec Holstein Club to host it?

1. President of Holstein Quebec 1978 and recipient of the Pierre-Léonard Recognition 2008, Eberhard Reeb. 2. President of Holstein Quebec 1989, Denis Vallée. 3. President of Holstein Canada 2005-2006, Pascal Lemire. 4. Honored for the Jean-Touchette Recognition 2008, Louis Bouvet. 5. Winner of the 2012 Pierre-Léonard Recognition, Michel Lemire. 6. Recipient of the 2021 Jean-Touchette Recognition, Richard Landry.



Expo-judges Conference 2014: The exhibitors at the Bécancour RCM Expo took advantage of their show to hold the Expo-judges Conference simultaneously.



2005 Provincial Judges Conference: The Drummond Holstein Club welcomed the Holstein judges to the grounds of the Drummond Show.

they innovated by trying a new activity: a Twilight evening. “It worked really well, more than 150 people came,” exclaims Dave. The Breeders’ Cup, which will be in its 6th edition in 2024, involves more than twenty participants year after year. *Sarra Eva Seaver*, EX-94 6E 3*, owned by Guylaine and Mario Sarrazin, is a regular at the activity, having been Honorable Mention in 2020, Reserve Champion in 2021 and Grand Champion in 2022.

The first provincial event organized by the young merged club was the Holstein Quebec Convention in 2015. Among the highlights of the event held in Drummondville, a discussion workshop on genomics was a strong start to the Convention program. Also, during the All-Québec Evening, a special video was presented in honor of *RF Goldwyn Hailey*, EX-97 5E 8*, owned by Gen-Com Holstein Ltd., who had just won five championships.

We cannot ignore the co-ownership of another member of the club, Ferme Antélimarck 2001 inc., with *Erbacres Snapple Shakira*, EX-97 3E 3*, also double Grand Champion in Madison and Toronto, just like *Hailey*.

Star brood cows of the club

<i>Tramilda-N Baxter Emily</i> , VG-85	42*	Michel and Alcide Boisvert
<i>Ronelee Boliver Dreary</i> , VG-86 USA	23*	Michel and Alcide Boisvert
<i>Comestar Lautama Goldwyn</i> , VG-88	22*	Freiland Holsteins
<i>Elkendale Cleitus Impala</i> , VG-87	19*	Silky Holsteins
<i>Wabash-Way-I Shottle Ember</i> , VG-88	16*	Ferme laitière Rayon D’or inc.
<i>Rayverley Prelude Evelyn</i> , EX	15*	Gilles Perreault, Francis Bréniel and Mélanie Perreault
<i>Idee Goldwyn Lynley</i> , EX-93 2E	14*	Gen-Com Holstein Ltée
<i>Antélimarck Dalida Morty</i> , EX-93 4E	14*	Ferme Antélimarck 2001 inc.
<i>Jeanri Aerostar Connie</i> , VG	14*	Silky Holsteins
<i>Chacock Louise Christopher</i> , VG-86	14*	Ferme Micheret inc.
<i>Lookout Goldwyn Lacie</i> , EX-92 3E	13*	Ferme laitière Rayon D’or inc.
<i>Ginary Bolton Sonja</i> , EX	13*	Olivier Fleury, Delapointe inc.
<i>Gillette Shottle Jewell</i> , VG-88	13*	Ferme Benjo 2003 inc., Ferme Gillette inc.
<i>Jol-Lee-I Duplex Moriana</i> , VG-88	13*	Ferme laitière Rayon D’or inc.
<i>Stépido Golden Girl</i> , EX 3E	12*	Daméstar Holstein, Raymond Tousignant et fils
<i>Vidia M Leader Titoune</i> , EX	12*	Ferme laitière Rayon D’or inc.
<i>Belle Du Jour Hango</i> , EX 6E	12*	Ferme Belle du Jour inc.
<i>Rosiers Bernet Persistent</i> , EX 4E	12*	Ferme Des-Rosiers



The organizing committee of the 2015 Holstein Quebec Convention.

Master Breeders



1965
H A P
Alex Proulx

1981
GREEN POPLAR
Norbert and Marcel Proulx

1983
BOUVELT
Louis Bouvet

1986-1998-2011
MICHERET
Ferme Micheret inc.



1987
SARRA
Alphonse Sarrazin

1988



BELLE DU JOUR
Gérard Sarrazin

BOIS MOU
Robert Lefebvre

CARSONDALE
Ross H. Carson

2003
SILKY
Silky Holsteins

2011
ROSIERS
Ferme Des-Rosiers

2021
RIGHTSTAR
Ferme Dave Tourigny inc.

2022
LAUZONNIÈRE
Mario Lauzon

Cattle: understanding without speaking

Every good dairy farmer knows that taking good care of their animals leads to productivity and therefore profitability. Since these animals do not speak, it is crucial to have a very keen sense of observation to be able to understand their slightest signs. By observing them carefully, many specialists have learned to interact with cattle in a way that minimizes their stress and negative emotions. Let's enter the world of human-cattle relationships.

The senses

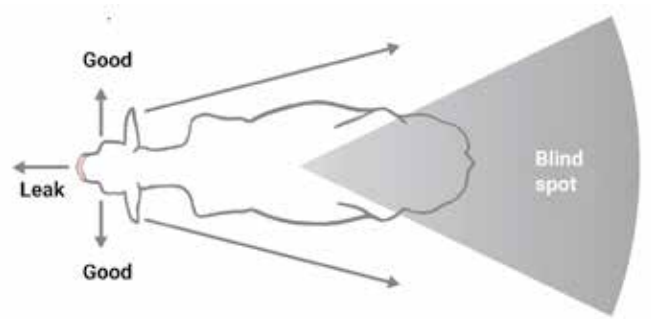
Contrary to what some may think, cows do not respond to human speech. Animals think more in terms of images, sounds, smells, touches and tastes, while humans combine all of these, in addition to adding words. On the other hand, they have certain senses that are much more developed than humans, such as hearing and sight, which are their two main ones, with the exception of smell which becomes predominant during the heat period.



By
Geneviève
Drolet, agr.
Editor

View

With eyes on either side of their head, it is mentioned in the literature that cattle have panoramic vision between 300 and 320 degrees, depending on the reference read. Only an invisible part located directly behind them does not allow them to see, unless they turn their head. It is called the blind spot. To avoid startling the animal and injuring someone, personnel should avoid suddenly approaching directly into this area.



The panoramic view of cattle.
Photo credit : Dairy farmers of Canada

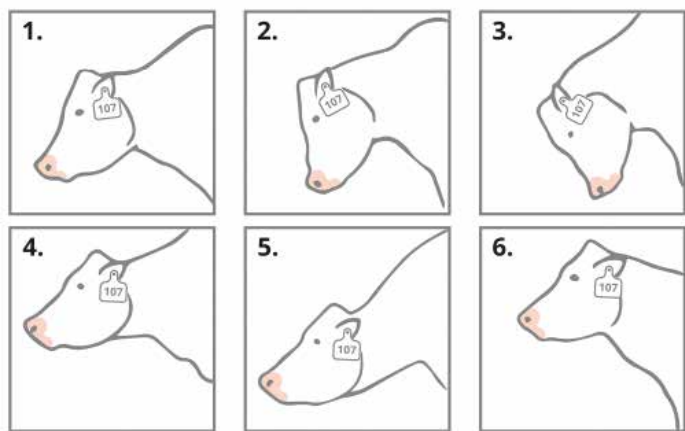


Since these animals do not speak, it is crucial to have a very keen sense of observation to be able to understand their slightest signs.

Photo credit : Hannah Crawford

Additionally, renowned professor Temple Grandin states in her book *Working with Farm Animals* that cattle only have two color receptors instead of three. They are called dichromatics. Since the red color receptor is missing, cows see instead in yellowish green and bluish purple. This particularity also means that they are more sensitive to light contrasts. Thus, when animals are moving, a cow may refuse to pass over a scupper which appears deep and dark to it while on each side of it, the floor is covered with pale shavings. Standardizing the surface of the floors, either with straw, shavings or sand, will help the animal to move without hesitation.

Also, this type of vision implies that they measure depths poorly. Temple Grandin indicates that while grazing, when animals are moving and are alerted by a color contrast, they stop and lower their heads to get a glimpse of the depth of the hole, ditch, etc. Thus, they are governed by the same instinct when moving around the farm. She recommends giving them time to lower their heads and analyze the situation. It will only take 30 seconds longer, but will save you from saying a few swear words... Moreover, Ron Hill of Texas A&M University says that the animal will be difficult to move if its nose is close to the ground or vice versa, if his head is in the air and he is lying in wait. Instead, you must wait for the animal's head to return to its normal position before moving it.



The meaning of the different head positions of a cow: 1. Neutral, 2. Slightly hostile, 3. Very hostile, 4. Confident, 5. Submissive, 6. On alert before fleeing.
Source : Dairy farmers of Canada

The accommodation time of the bovine eye to changes in light is five to ten times longer than in humans. Their visual acuity, that is to say the focus necessary to distinguish distant objects, is also slow. "It is therefore preferable to move slowly and without abruptness," reports Pauline Garcia, breeder of Salers cows in Cantal and animal behaviorist. Also to facilitate entry into a holding cage, for hoof trimming for example, the breeder should always remove any object, belt, chain, etc. which disturb the visual environment of the animal. The fact that the cow's eye has to detect as few objects as possible will speed up its movement. Also, it is advisable to have good lighting throughout the travel corridors.

Hearing

Being one of the most developed senses in the cow, its hearing can hear lower, but also higher, frequencies of sounds than humans. Thus, being sensitive to high-pitched sounds, screams and whistles can easily disturb animals. To remedy this, they will appreciate some background noise, for example a radio that is constantly playing in the barn. Having constant sound in their environment will alleviate sudden noises that can create stress.

Animals are also very sensitive to the tones of the people around them. They recognize the voice of a kind person who treats them well and conversely, they will remember a person who did not give them good care. We note that the best free-stall herd managers are completely silent when moving the animals. By avoiding loud sounds and unnecessary noises, we notice that the animals remain calmer and are easier to move (Temple Grandin, *Working with farm animals*). To add to this, a study by Pajor et al. (2000;2003) demonstrated that shouting was as aversive as using an electric livestock prod!

True or false?

Dairy bulls are the most dangerous of domestic animals, even more aggressive than beef bulls.

TRUE

In the literature, it is claimed that since they are raised alone, away from their mother, dairy males consider humans as their own and therefore seek to demonstrate their hierarchy to them as they age. If you have a bull on your farm, it is essential to detect the signs of aggression that a bull may show. When it senses a threat, it positions itself sideways and turns its head to demonstrate its size. Then, he turns around to face his future victim, tapping and scratching the ground. Then he charges. Regardless of the situation, it is recommended to never turn your back and run. The safest thing is to look away at the slightest sign and quietly back away. No one should keep a bull that shows signs of aggression.

Touch

Cattle are gregarious animals. They like to feel the presence of other animals around them, specifically at a distance of less than a meter. Therefore, when traveling, it is important to do so in a group rather than one individual at a time, when possible. Starting with the dominant individual in the hierarchy, the other members of the herd will instinctively follow the latter. In the event that an intervention is necessary on a single animal, leaving the animal in visual contact with the rest of the group will be more reassuring for it. Also, when touching animals, humans should always try to imitate the licking of a mother with her calf. A firm contact will calm the bovine while caresses will irritate it.

Memory

Just like humans, animals have memories. They store sensations based on the interactions they have with their environment and make positive or negative associations between them. Indeed, if the first experience with an object or a person does not go well, the animal will remember it the second time. Knowing this, it is useful to make the animals' first experiences non-stressful in order to prove to them that their environment is safe.

Throughout interactions with animals, it is imperative to develop a relationship of trust with them. In a presentation by Anne-Marie de Passillé at the 2008 Dairy Cattle Symposium, she states that "the relationship between animal and human begins to take shape early [...] numerous studies demonstrate that delicate treatments and handling and frequent young animals reduce their fear of humans when they are adults (Boissy and Bouissou, 1988). » De Passillé goes on to say that it is important to take the time to tame our young heifers to improve contact for life. Moreover, in her conference, she reports that "in farms where the animals are less afraid of humans, we have observed higher production rates. » (Hemsworth et al., 2000)

In the case of cattle headlocks, the first times a heifer or cow has to put its head through the barrier, avoid immediately using the lock. She must first acclimatize to her new environment, to the sound of the barrier slamming against the other, etc. When she

understands that there is nothing to fear, it will then be easy to immobilize her in the headlock to carry out the desired intervention, for example, vaccination. Moreover, an animal that is stuck in a headlock the first time for the administration of a vaccine will associate the headlock with pain and will be afraid to return there a second time. On the other hand, if he is used to receiving feed there daily, the experience will be, conversely, positive. Also, "when an animal is trapped in a headlock and is agitated, we recommend letting it calm down before releasing it. Otherwise, he will make the connection that he can get angry to get what he wants," says Pauline Garcia.

In the case of dehorning, it is advisable to administer an analgesic before carrying out the procedure. So, when the effect of the medication wears off and the calf begins to have pain, it will not be able to recognize the source of this pain.

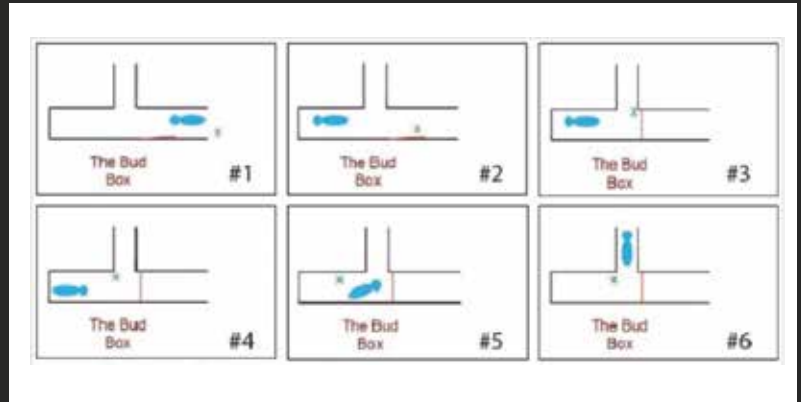
Another example, when starting with a robot, it can be useful to let the animal pass inside the robot cage without having it milked the first time. Additionally, adding feed during robotic milking helps make the experience even more positive, which fits perfectly with the behavioral principles of cattle.



Photo credit : Hannah Crawford

The Bud box

The utility of the Bud box is to bring the animals where the breeder wants them: we use the principle by which the cows always want to return where they came from. We bring the animals to a park where the bottom is a dead end. We then close a barrier behind us, the barrier being located just after the path which must be used by the animals to get where we want. Using the balance point of each animal, we move to slowly move each of them towards the aisle.



Whether for trips to the pasture, in the free-stall barn or other, since we know the principle, this type of arrangement can easily be improvised almost anywhere using stakes, ropes, chains or barriers.

Photo credit : Michelle Proctor, University of Missouri

Another example, when starting with a robot, it can be useful to let the animal pass inside the robot cage without having it milked the first time. Additionally, adding feed during robotic milking helps make the experience even more positive, which fits perfectly with the behavioral principles of cattle.

If a dairy farmer must move animals using a trailer, it is imperative to drive carefully and accelerate gently, without braking suddenly to prevent the animals from losing their footing. This will help make the experience positive and help with boarding the trailer the second time. It's also the same principle at the show. To get the heifers used to the judging arena, we recommend going there before judging day to acclimatize to the environment. In this way, the animals will develop a relationship of trust and they will get used to what is happening around them. Moreover, we notice that on certain farms, the cows are calm despite the presence of

children screaming and playing in the alley. While in others, the cows will be frightened when a child comes, because they are simply not used to it.

The only contradiction is that Temple Grandin asserts that young calves have not yet acquired the ability to memorize experiences, however negative they may be. So, until a few weeks of age, they will not yet make the association between a bad experience and fear. Following this logic, it is reasonable to think that ear tags can be applied very early, without causing negative effects on the animal's



Photo credit : Hannah Crawford

Travel

Several of Dr. Grandin's experiments have demonstrated that handling and moving animals gently not only prevents accidents, but the animals are also less likely to get sick. To fully understand the principles of movement of dairy cattle, it is imperative to know the imaginary zones that surround the animal:

The pressure zone: This is the more distant area around the animal. When a "predator" enters this area, the animal turns its head and becomes alert. He waits to see what happens next.

The escape zone: This zone is located between the pressure zone and the animal. So, a human who has entered the pressure zone and continues to advance towards the animal will then enter the escape zone. At this moment, the animal which can no longer "stand" the presence of humans will turn around to move away.

The size of these zones varies if the animals are more or less tame. In dairy cattle accustomed to the presence of humans around them, we will mainly use the balance point to encourage movement.

The balance point: It is a landmark located between the ear and the shoulder of the animal. When passing near this part, the animal will automatically start walking in the opposite direction to escape.

“ Whenever we apply pressure, we should always remove it afterwards, since it constitutes a sort of reward. Proper handling results in a good balance of pressure and release. ”

- Dr Frédéric Tremblay, Bureau vétérinaire Sainte-Marie

A good herd manager will know how to properly use these areas to move animals without risk of injury. You will need to move close enough to the animal to apply pressure causing movement, and then remove the pressure by stepping back one or a few steps. Then move forward again to make it work and move back to release the pressure. A bit like a waltz movement. Dr. Frédéric Tremblay, veterinarian at the Sainte-Marie Veterinary Office, indicates in one of his presentations « that each time we apply pressure, we should always remove it afterwards, since it constitutes a kind of reward. Proper handling results in a good balance of pressure and release. »



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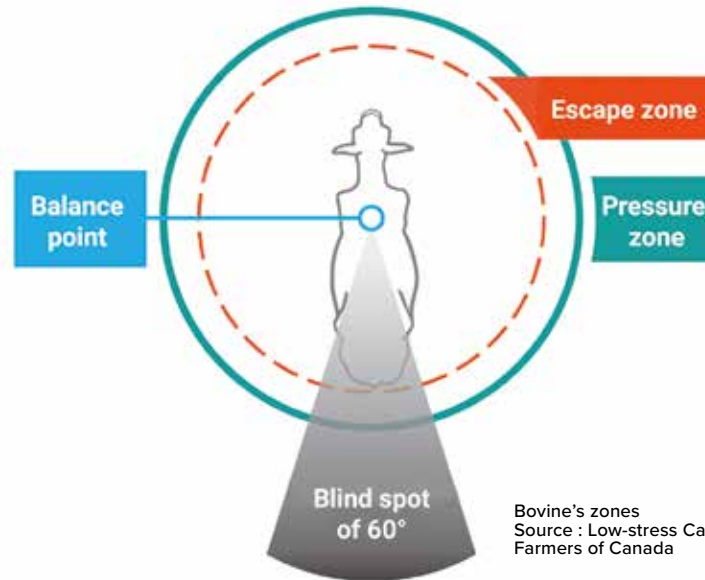


The magnitude of the escape zone and pressure zone varies if the animals are more or less tame. If you stay quiet near them, they will come to you to get to know you.
Photo credit : Hannah Crawford

In parks, it is even recommended to enter through the place where the animals exit; they will already have their heads pointed in the direction to go. Cattle like to see where they are going, while keeping an eye on the person who is leading them. We must therefore make sure to facilitate these two concepts for the animal, by moving back and forth, parallel to the animal, from one side to the other of the point of balance while keeping the place where they must go, free. In this sense, pulling the animal using a halter while being placed directly in front of it goes against all these principles! Lengthening the halter cable and positioning yourself to the animal's side near the balance point will allow for smooth movement. It will be possible to control the trajectory of the animal with the halter if it ever deviates.

Milk producers work with their animals every day. In order to make interactions between them pleasant, it is imperative to know how to carefully observe their slightest behavior. According to Temple Grandin, this is one of the most important things about managing a herd. She suggests taking time every day to observe your animals. You need to know how they spend their time, how they move and interact with each other, how they eat, etc. This is the best way to know what is normal and what is not.

To help, several research studies have demonstrated certain particularities of cattle: they like tranquility, take the time to see where they are going and get used to their environment. Their instinct guides their fear and staff who work with them can take advantage of this instinct when moving by using their pressure zone and balance point. But, above all, what you need to remember when working with animals is that you have to take the time... to take the time!



Resources :

Boissy, A., & Bouissou, M. F. (1988). Effects of early handling on heifers subsequent reactivity to humans and to unfamiliar situations. *Applied Animal Behaviour Science*, 20, 259-273.

Grandin, T. *Working with farm animals*, Storey Publishing, États-Unis, 2017, 9-113

Hemsworth, P. H., Coleman, G. J., Barnett, J. L. & Borg, S. (2000). Relationships between human-animal interactions and productivity of commercial dairy cows. *Journal of Animal Science*, 78, 2821-2831.

Pajor, E. A., Rushen, J., & de Passilé, A. M. B. (2000). Aversion learning techniques to evaluate dairy cattle handling practices. *Applied Animal Behaviour Science*, 69,89-102.

Pajor, E. A., Rushen, J., & de Passilé, A. M. B. (2003). Dairy cattle's choice of handling treatments in a Y-maze. *Applied Animal Behaviour Science*, 80, 93-107.