



BullSense

Roy Berg, cattleman, teacher and tenacious advocate for using sound science to raise functional cattle at a time when his views were far from popular, died last May. He was 85.

More than a few Beefbooster members learned the theory and practice of animal genetics from Berg. His students and fellow faculty considered him one of the university of Alberta's finest teachers.

Berg didn't simply follow the accepted system of lecturing. He wanted his students to think. Mick Price, who began working with Berg in 1974, recalls him explaining how he convinced himself that lectures were a waste of time. He talked about the need to know the birth weight of a calf, and advised students they should carry a length of wood to estimate calf weight. "Balance the board on a hard rock, put the calf on one end and pile rocks on the other end 'till it balances. Then, guess the weight of the rocks." Every student was still dutifully taking notes as he delivered the last line. From then on, he had students research topics for themselves and present their findings.

Berg brought the same "show me, don't just tell me" approach to research and sharing scientific information with cattlemen.

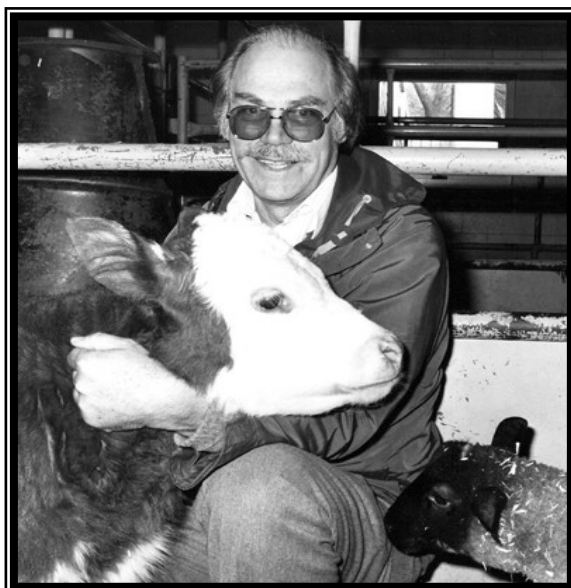
"At the time, the purebred business was dominated by the show people," says Charlie Ewing, who calls Berg one of his mentors. "They thought they were the elite. Many people accepted that, but they had their own little industry that had nothing to do with the commercial cattle business."

Ewing describes Berg as "a real cattleman who was all about helping people in the commercial business make money." That meant crossbreeding and taking advantage of hybrid vigor.

Shifting the mindset of almost an entire industry wasn't going to be easy. Berg set up his famous crossbreeding program at Kinsella in the early '60s. It compared performance of purebred, crossbred and hybrid cattle.

ROY BERG

1927 – 2012



Breeders protested, calling his cattle 'mongrels' and 'Berg's bastards,' telling him they had the wrong feet and legs. But, according to Price, "He just said, 'if they grow the fastest, you're wrong.' He didn't care about feet and legs or an animal's parents. He stuck to his selection criteria for 30 years.

"Roy didn't compromise. If he disagreed with you, he wouldn't hide his opinion. But, you couldn't dismiss him. He had credibility."

Despite this attitude and his sense of humor, Berg didn't find it easy. In later years, he wrote that he wasn't sure he'd have kept going without the support of his friends in the cattle business, particularly the people who started Beefbooster and performance testing.

Sherm Ewing (Charlie's father) was one of the handful of cattlemen with ideas like Berg's.

When they were setting up the Alberta Cattle Performance Testing Association, the alphabet society as they called it, they asked Berg to help.

"He taught me an awful lot about animal genetics and wherever that led," says Ewing. "Roy had all sorts of scientific evidence for the advantages of crossbreeding and his research reinforced some things we'd started doing, particularly performance testing."

At the time, most people selected cattle on pedigree. It was common for only 60 % of cows to calve, feet were trimmed, people spent lots of time milking out bad udders and helping calves suck. They stayed up all night to help heifers calve.

"We started performance testing because we needed to know what was and wasn't heritable," says Ewing. "Most people thought it was a waste of time, that we and Berg were wrong. It took a long time for the cattle business to change. We wanted a record of performance so we could select on performance pedigree. We were able to share a lot of information from the herds that started Beefbooster with Berg, and we got a lot from Kinsella and the U of A as well as from US research.

"Roy Berg was a very positive influence and a great friend to Beefbooster. We were glad to have him at our meetings." 🐮

**Beefbooster
Bred Heifer Sale
on TEAM
November 30, 2012
11:00 am**



Helping people raise cattle more profitably

Kinsella Ranch is a great place for cattle. It has rolling hills with native and improved grazing, water, trees and bush for shelter. A fine place for cows to raise their calves and a family to work for and thrive on the benefits of the cattle. For over 60 years, Kinsella Ranch has had a bigger role as a testing ground for science for the beef industry.

In the 1950s, Roy Berg and his boss, Laird McElroy, wanted a ranch to help the university prove which theories really changed cattle performance. They persuaded Agriculture Minister Lawrence Halmrast to help. Halmrast found funding and Berg found Kinsella, 150 km SE of Edmonton.

In 1961, the government gave the university a 50-year lease. The university negotiated a new permanent deal in 2010. The total lease is now 7,616 acres of rough fescue and porcupine grass with aspen and tame pasture.

The main function of the ranch was as the site for Berg's long-term study on cross-breeding and hybrid vigor. He compared purebred Hereford, which dominated the beef industry, with Hereford, Charolais and Galloway hybrids. Later, he used Brown Swiss, Simmental and Hereford to develop a dairy synthetic strain for another comparison. The original cattle weren't selected for their quality, just breed. Berg used a strict selection program.

Berg's target was functional cattle that would gain quickly, be feed efficient, fertile, good mothers and produce high quality carcasses. His selection criteria were a live calf and a high rate of gain. The hybrids were clear winners. Fewer were culled for not having a calf and they gained faster than purebreds. The dairy synthetics needed more feed to grow and reproduce.

In 1984-'85, beef synthetic bulls were compared to the best of various breeds. The hybrids averaged 4.4 lbs of gain per day compared to 3.4 lbs a day for the top breed group of the industry.

Berg spoke at Western Stockgrower Schools that were regularly attended by 200 to 300 people who came to see his "ugly" cattle as well as the latest technology. Controlled grazing systems attracted a lot of attention.



KINSELLA RANCH

Stockgrower Schools continue, but the controversy has gone. Berg's ideas are standard and attendance is usually around 50 people.

Berg's ideas on cattle selection have been proven. Ranch manager Barry Irving and his staff look after the cow herd. At calving time they help about 50 calves, either in delivery or sucking. Of these, Irving expects 40 from the 100 Charolais, 7 from 200 Angus, and 3 from the 400 hybrid cows. Beefbooster remains committed to supplying M4 bulls for that synthetic herd.

Performance testing of bull calves has always been a major part of ranch work at Kinsella. These days, the testing is part of a huge genomics program involving Genome Canada, Agriculture and AgriFood Canada, the Universities of Alberta and Guelph and as of this year, Beefbooster.

Technology has helped ease some of the work—bunks identify each animal, record the amount it eats and transmit the information to researcher computers. A new handling system eases movement and weighing of the cattle.

The genomic program aims to predict an animal's potential performance at an early age using its DNA. Alberta Agriculture beef researcher, John Basarab, compares it to Version 1 of DOS, it's just starting to be useful.

Kinsella makes a big contribution because the performance of all its cattle has been documented. Just eight bulls, two of them composites, are the most influential animals.

a fine place for cows to raise their calves and a family to work for and thrive on the benefits of the cattle

The entire genomes of these animals have been sequenced. Now, 50,000-snip chip results for those bulls will be compared to those of other animals in the herd and linked to traits in live animals.

In other research, Basarab is measuring residual feed intake in individual animals. "We're using the cattle to see if we can link growth rate to feeding behavior," he says. Fidgety eaters have feed efficiencies as good as those of animals that just go to the bunk and chow down." Other researchers are studying carcass quality using Kinsella cattle. Now, research teams are much bigger than in the days when Kinsella was first linked to cattle research. We need bigger teams working with complex technology.

"There's no single big player like Berg," says Irving. "Berg showed how to get more calves. Even a poor calf is so much better than no calf. It makes a big difference. Today, we're working for ever smaller improvements in efficiency."

As well as its huge role in animal breeding, Kinsella is an important facility for U of A students and faculty to study wildlife, ecology and range management. 🐾

CATTLE FOR SALE

COW DISPERSAL SALE

20 M1 Cross Heifers Bred M3

150 M1/M4 Cross Cows Bred M1 and Tx

Contact: Tom Lelond (204)562-3646

HEIFERS/TWO YEAR OLDS FOR SALE

50 Heifers sired by M1/M4 bulls bred to M3 Heifer bulls

Two year olds bred to M1/M4 bulls

Contact: Ed Bosch (306)669-2188



Kinsella photos courtesy of Curtis Vieville