

# France is a good place to be a dairy cow

THIS past fall, I made my first visit to France to see French dairy breeds and attend the annual meeting of "S-1040." This research group includes just about all dairy genetics researchers in the U.S., plus a few others with similar interests.



Cassell

An annual meeting in France sounds a little like a junket, but we're pretty stingy with travel dollars when we can get our hands on such funds. We met a few years ago at the Cincinnati airport! Thanks to French generosity and Les Hansen's efforts, this trip was both reasonable and valuable. I found it particularly beneficial to share science with European colleagues who were able to attend.

## Two unique breeds

The real thrill of this trip was French cows, dairy farmers, and the industry that supports them. We spent three days near the ancient fortress town of Besançon which is home turf to the Montbeliarde breed. These large, gentle, and generally good-uddered creatures reminded many of us of Simmentals. Simmental beef cattle were introduced in the U.S. in the 1970s, and that beef breed's characteristics has formed a pretty firm impression in many of our minds since we saw them first.

We are less familiar with Montbeliarde dairy cattle that have a long history, independent of Simmentals, dating back to at least the 1870s. They are the second most numerous dairy breed in France, as the table shows, and are a very productive breed. Montbeliarde are dairy cows, **not** dual-purpose Simmentals, and they may work very well in U.S. management systems.

We also toured dairy farms in Normandy, starting near the beach town of Arromanches, where Canadian and British forces landed on D-Day. Normandy is home to Normande dairy cows, the third most numerous breed in France, and a favorite for cheese producers. Sturdy Normande cows don't give as much milk as the Montbeliarde, but the breeds are very similar on components. Normande cows have high protein percentages and a useful mix of fat to protein for cheese production.

The breed suffered terribly during the Second World War, as the Normandy dairy country was directly in the path of the greatest invasion in history. The war certainly contributed to the replacement of many Normande cows with Holsteins, the most

numerous breed in France. Montbeliarde, generally located on the other side of France, apparently suffered less. Normande cows have smaller udders and particularly lower rear udder attachments than their U.S. Holstein cousins. I saw some feet and legs that raise questions about exposure to continuous concrete, but all breeds, and people, too, suffer from constant exposure to concrete.

Table 1, based on information distributed during the trip, compares Holsteins to Montbeliarde and Normande cattle under French management systems. Productivity is lower than for U.S. cows. The rations we saw included grass and/or corn silage with little corn grain, perhaps some straw, and little else. I recall a herd where I kicked some TMR towards the cows and was surprised at how light the feed was in comparison to our rations. U.S. TMR mixes are much heavier from the addition of concentrates and fine chopping of forages.

## Less demanding

The French dairy industry uses a quota system, so total milk production is controlled. I did not learn enough about the quota system to say a great deal, but one farmer told us that his milk quota was tied to a

the label on a beef roast in a grocery store. It had a **pedigree** on it — sire breed, dam breed, age of the animal — and the bar code could lead to even more information about the source of the meat should the consumer desire it. In the U.S., we don't share such information with the consumer. Some of our farmers would oppose such a system bitterly. But the French expect it, and it does unite the food producer and the food consumer, for better or worse.

Having seen these cows on their home turf, in their working clothes, do they have a role in U.S. production systems? I must say honestly that I think we will find some things about them that we do not like in total confinement systems with high-energy rations. Mobility might be an issue, as neither breed is small. They are more muscular and carry more flesh than Holsteins.

Managers who cull their herds "by eye" would make a lot of mistakes at first judging which Montbeliarde or Normande cow was milking and which one was wasting feed. We know something about fertility of first crosses of these two breeds in U.S. conditions. Crosses of Montbeliarde and Normande in California commercial herds have shown

Table 1. Actual 305-day yields for French Holstein, Montbeliarde, and Normande\*

Breed	No. records	Milk, lbs.	Fat, lbs.	Fat, %	Protein, lbs.	Protein, %
Holstein	1,847,614	16,964	666	3.92%	531	3.13%
Montbeliarde	404,874	13,411	518	3.86%	434	3.23%
Normande	268,612	12,403	525	4.23%	423	3.41%

\*2008 data

land base. To make more milk, he needed more quota which required more land. Several herds we visited endeavored to turn cows on grass every day. The leg structure on some of those Normande cows that caught my eye is likely perfectly adequate for such a management system. In general, the French do **not** ask dairy cows to work as hard as dairy cows in the U.S. Here's a thought: Maybe the French culture doesn't ask **farmers** to work as hard as the U.S. consumer expects U.S. farmers to work. Cheap food is produced at a cost to somebody, and in this country, much of that cost is borne by the cow and the farmer who manages her.

We learned a little about the French system of protecting the point of origin of different foods and beverages. The system would be like applying a patent to milk produced in the Shenandoah Valley in Virginia, for example. Promotion of local products is encouraged, expected, and respected, from what I could tell. This is a really different approach from our mass production system.

Our host in Normandy showed me

strength in fertility. The French don't use needles like we do to get cows bred, and I learned nothing about how these two breeds would respond to estrus synchronization programs. One thing I can say is that both breeds show heats on French bedded packs, as we saw plenty of mounting activity in the herds we visited. It was refreshing since I hate needles.

I learned that the French are committed to genetic improvement. They consider it to be in the interest of society to preserve local breeds and to improve farm animals. They invest accordingly. They value locally produced foods and apparently consider their farm communities a national trust. I'm sure they have plenty of squabbles with their system, as they are people with independent ideas, but I did see healthy, happy cows.

The owners and managers, family members in all cases if I understood the translations, loved their cows and welcomed guests. I find myself wondering whether the dairy farmers I work with are as satisfied with their lot in life as the French dairy farmers we met.