

# Animate<sup>®</sup> CASE STUDY

Anionic Mineral Supplement

**Farm Name:** Vander Wal Dairy  
**Operator's Names:** Greg and Allen Vander Wal (brothers)  
**Farm Location:** Slayton, Minn.  
**Herd Size:** 450 Holsteins  
**Rolling Herd Average:** 23,000M, 850F, 725P  
**Problem:** Sluggish eating in close-up and fresh-cow groups  
**Solution:** Animate<sup>®</sup> Anionic Mineral Supplement

**W**hen you offer up your herd to your feed company to test new products, you get the benefit of being first in line for some of the newest developments in feed and nutrition. You hope for some home runs once in awhile.

Greg Vander Wal describes his most recent research experience as a home run.

Wanting practical field experience, Hubbard Feeds often turns to Vander Wal Dairy, Slayton, Minn., to test the latest in feeds and feeding. With a 450-cow Holstein herd, "we test a lot of different products," says Vander Wal, co-owner of Vander Wal Dairy.

This time Dr. Ken Swanson, senior ruminant nutritionist at Hubbard Feeds, approached the Vander Wals with a new product for transition cows called Animate<sup>®</sup> Anionic Mineral Supplement.



Dr. Carla Kuehn, nutritionist for Vander Wal Dairy, inspects and discusses the herd's current feed composition with Greg Vander Wal.

Vander Wal was apprehensive. "I tried anionic salts in the past and didn't have much luck," he says. "My close-up cows were always finicky eaters. The anionic salt products made them even more finicky. Dry matter intakes were sluggish, dropping to as low as 20 pounds per cow per day when salts were included in the ration."

Vander Wal's previous experience with anionic salts was typical. The upside of anionic salts is that they mobilize calcium reserves and help ease the cow's transition from non-lactating to lactating status. Low palatability has always been the downside. This trade-off never made the product "worth its salt," so to speak. But Dr. Swanson convinced Vander Wal to try Animate on a

research basis, hoping it would not only help his close-up cows' transition to lactation, but also maintain feed intake before and after freshening.

## Low Inclusion Rate

So, in the spring of 1999, Vander Wal Dairy's close-up cows were fed a TMR that included one pound of Animate per cow per day. Vander Wal immediately noticed a difference with this supplement. "When we tried the other products, I could definitely smell an odor. With Animate, there's no strange odor," he says.

Along with his nose telling him there was something different, so were the close-up cows. Dry matter intake jumped from 20 pounds per cow per day to 30 pounds or more.

Increases in dry matter also were seen in the fresh cows. "With Animate, the fresh cows are consuming between 35 to 42 pounds per cow per day, about a 10-pound improvement," says Vander Wal.

In the initial research project, 17 transition cows were tested. "All 17 freshened without any sign of a metabolic disorder," says Dr. Swanson. Vander Wal claims that "less than 5% of the herd has problems with DAs — a major improvement — and that 5% isn't just limited to the fresh cow group."

Dr. Swanson also tested urine pH levels and saw a dramatic improvement, indicating that the product was effective in controlling the anion-cation balance. "Before the cows went on Animate, pH levels ranged from 8 to 8.5. After supplementation, the range dropped to an average of 6.7," says Dr. Swanson.



Animate<sup>®</sup> helps control anion-cation balance, lowering pH levels to 6.7.

**"With Animate, the fresh cows are consuming between 35 to 42 pounds per cow per day, about a 10-pound improvement," says Greg Vander Wal.**

## Base Mix Ration for Vander Wal Dairy Transition Cow Group

Close-Up Ration Ingredient	Pounds As Fed	Pounds Dry Matter Fed
Close-up Mix*	4.00	3.54
Corn	3.00	2.55
Distillers W/S	2.50	2.30
Cottonseed	0.50	0.46
Alfalfa Hay	7.19	6.20
Corn Silage	38.21	12.87

\*Mix includes Animate Anionic Mineral Supplement.



The Vander Wal's fresh cow dry matter intake has increased 10 pounds since Animate® Anionic Mineral Supplement was introduced to the herd.

### Maintaining Intakes

Dr. Carla Kuehn of Hubbard Feeds, the Vander Wal's current nutritionist, balances the ration on a weekly basis. "Currently, we're feeding between 1.0 to 1.3 pounds per head per day of Animate, depending on the potassium levels of the forage," says Kuehn.

According to Dr. Kuehn, dry cows are brought into the close-up pen three weeks before calving, and Animate is added to the ration. The Vander Wals use a software program that monitors mixing, feeding, intakes and inventory.

"Since we introduced Animate more than a year ago, we're seeing the close-up cows maintain their intakes, and we are noticing appropriate pH levels," Dr. Kuehn says. "And we haven't seen any major milk fever or ketosis problems since adding Animate."

*"For every pound of increased dry matter intake, producers can expect an increase of 2 pounds of milk," says Dr. Mike Hutjens.*

### Palatability Pays

Vander Wal figures it costs about \$0.72 per cow per day to feed Animate. Vander Wal believes the 5- to 10-pound increase in close-up and fresh cow feed intake will pay off in the milk tank. "I know it's a sound investment," he says.

"For every pound of increased dry matter intake, producers can expect an increase of 2 pounds of milk," says Dr. Mike Hutjens, professor of animal science at the University of Illinois. "Anionic minerals can provide a 10:1 return on investment. Additional research is needed to determine optimal combinations of anionic minerals, levels and length of feeding, but results show a potentially rewarding benefit to cost ratio."

### Veterinary Costs Associated With Metabolic Disorders\*

#### Ketosis

- Average cost per clinical case = \$145
- 5% of affected animals are culled
- Typical milk loss is 440 pounds
- 66% of the time, ketosis occurs in combination with/or following milk fever, DA or metritis

#### Displaced Abomasum

- Average cost per case = \$340
- 10% of affected animals are culled
- Average milk loss is 840 pounds
- 2% of all cases die

\*Costs are based on research done by Chuck Guard, Cornell University, 1996.

The decrease in metabolic disorders pays big dividends too, says Vander Wal. "Because cows are eating better, we've decreased the number of cows that freshen with ketosis or displaced abomasums."

As for testing anymore new products for Hubbard Feeds, Vander Wal says, "Sure, but I'd prefer not for my transition cows. You can't do any better than a home run. Animate is working."

**Animate**  
Anionic Mineral Supplement