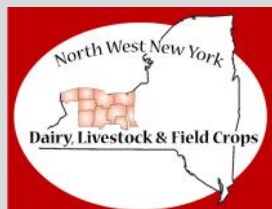


Photo source: Cathy Wallace

Ag Focus



Salmonella Dublin: Tough, Spreading and Worrisome

By: Jerry Bertoldo, DVM

Salmonella is a gram-negative bacteria closely related to *E.coli* most often associated with severe diarrhea in farm animals. Some species and sero-types (sub-species) of Salmonella are transmissible to man (zoonotic). They are categorized by their biological characteristics and have varying degrees of severity in different host species.

The most common Salmonella in cattle historically has been *S. typhimurium* (a Type B) capable of affecting all ages, but particularly fresh cows and calves. *S. newport* (a Type C) has caused sporadic, severe calf and adult diarrhea outbreaks over the last 30 years. Within the last 10 years or so it has been *S. dublin* (a Type D) that has presented a different and more sinister challenge in the Northeast after establishing itself in other dairy regions of the country.

Why is Dublin a Particular Worry?

Unlike its other Salmonella cousins, dublin's major impact is on the respiratory system not the digestive tract. In fact most cases of *S. dublin* never experience diarrhea. It is also different by its classification as a host adapted species in cattle, a trait that enables it to more easily survive, multiply and spread within the population.

S. dublin is very contagious as are other Salmonellas. They, more than

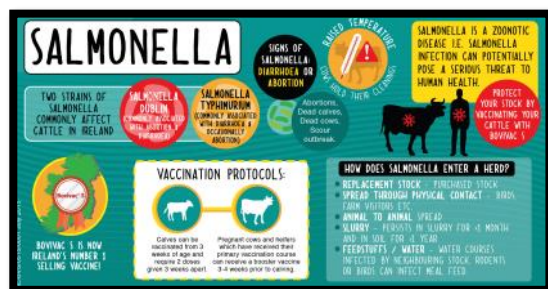


Photo source: <http://www.bovilis.ie/salmonella>

most pathogens, easily enter the blood stream and spread throughout the body. As a result they are shed through nasal discharge, saliva, feces, milk and uterine fluids. Transmission can be fecal-oral, oral-oral, but more problematically as a respiratory disease

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Mission Statement

The NWNy Dairy, Livestock & Field Crops team will provide lifelong
education to the people of the agricultural community to assist them in
achieving their goals. Through education programs & opportunities, the
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- ◆ Enhance the profitability of their business
- ◆ Practice environmental stewardship
- ◆ Enhance employee & family well-being in a safe work environment
- ◆ Provide safe, healthful agricultural products
- ◆ Provide leadership for enhancing relationships between agricultural
sector, neighbors & the general public.

Continued from page 1

via the nose to nose and aerosol routes. This makes group housing and common feeding nipples, water troughs and feeding areas all risks for transmission. A carrier state exists with dublin. These animals never show illness, but shed the bacteria on a consistent basis, if not at varying levels. In California where the problem has been prevalent the longest it is estimated that 50% of dairy cattle would test positive for *S. dublin*.

What Do You Look For?

S. dublin most often affects calves between 4 and 8 weeks of age; however this can vary from as young as 2 weeks to as old as 5 months. Signs of problems often begin as with any respiratory issue – fever, depression, increased respiration rate, off feed. It is the rapid speed with which cases can progress and lead to death that is notable. Some calves may not appear very ill until close to death. Almost no approved antibiotics have been effective. Unfortunately, it may be just a matter of time before effective treatments will join the ranks of “once, but not now.” A related bacteria, *S. heidelberg*, has been identified in calves in 10 states that has a broader antibiotic resistance pattern than dublin. Some 36 people have been sickened and diagnosed with this bacteria. Dublin has rarely been incriminated in human disease. The Centers for Disease Control have completed their investigation. Animal origin salmonellas are in the spotlight again. The discussion about antibiotic use in food animals and the potential resistance conveyed to the human population will intensify.

What Prevention and Control Measures Are There?

As with most diseases, a closed herd scenario is ideal. It is possible to bring in a pathogen such as *S. dublin* via visitors, birds, rodents, fair animals and cattle trucks without buying cattle. Good ventilation versus poor can make a significant difference in the number of calves resisting infection. Immune suppression brought on by inadequate nutrition, cold & heat stress as well as other diseases such as coccidiosis significantly increase the risk of infection upon exposure.

One licensed vaccine, Entervene-D®, has been

useful in preventing and controlling outbreaks. It is a live culture product. It has a reputation for a high percentage of allergic reactions particularly on the second dose. Use of Entervene-D® off label as an oral product has been common in an attempt to avoid deaths due to anaphylaxis. The live nature of the vaccine and interaction in the tonsil tissue was thought to make this idea viable. It has been shown, however, that no detectable antibodies can be found after oral use in contrast to the injectable route. Note that autogenous bacterins have been used as well. Newer technology vaccines are being studied.

Diagnosis can be made in several ways: necropsies and tissue cultures on calves dying of pneumonia, particularly ones treated quickly and appropriately; blood cultures on calves acutely ill with respiratory signs; blood samples on recovered calves at least 7 weeks after treatment to detect dublin antibodies; bulk tank culturing or ELISA testing to determine if carrier(s) are in the herd.

It is important to work with your veterinarian to investigate unusually severe respiratory problems or sudden deaths with minimal signs of disease in calves. Drinking of raw milk in any instance where a Salmonella problem is suspected should be prohibited. Individuals working with sick calves should always be aware of hand cleanliness for their own sake and for disease transmission amongst calves. The use of power washing in proximity to calves should be avoided to avoid aerosolizing pathogens of any kind from walls, mats, floors, panels, wire or gates. Dust masks at least are wise for those doing the spraying.

With the number of herds with *S. Dublin* estimated to be nearing 100 in NY the time is now to be attentive and proactive in managing calf health.

For more information go to: <https://ahdc.vet.cornell.edu/news/salmonelladublin.cfm> and <https://www.vetmed.wisc.edu/dms/fapm/fapmtools/7health/Salmorev.pdf>



Johne's Disease: Beyond the Bovine

By: Nancy Glazier

Johne's disease has been around for a long time, possibly as early as 1826. d'Aroval may have first reported it in cattle with enteritis with chronic diarrhea in cattle. In 1895 Johne and Frothingham described the disease and demonstrated its presence from a diseased intestine.

The disease is caused by the bacterium *Mycobacterium avium* ss paratuberculosis or MAP. It is sometimes referred to as paratuberculosis. It infects the mucosal lining of the ileum (small intestine) which results in inflammation and thickening so nutrients are no longer absorbed. Symptoms are diarrhea, weight loss despite a normal appetite, though variable between species.

The real danger of Johne's disease is due to the "iceberg" effect. For every clinical case of the disease in a herd, there can be 15 to 25 animals subclinically infected. The iceberg steals profits through reduced production, increased secondary diseases, culling of animals, and increased feed costs.

Johne's is a worldwide disease and not just disease of the bovine anymore. It can infect ruminants (dairy, beef, sheep, goats, elk) and non-ruminants. Though infection may occur in non-ruminants (mice, fox, birds, raccoons, etc), they are considered dead-end hosts. Rabbits and hares are the exception here. An area in Scotland has been studied and showed the rabbit population is infected with the same strain of MAP. Reinfection of offspring occurs without exposure to the cows. There have been some studies done looking at MAP and its possible connection to Crohn's disease in humans. Variable results have been shown. It is present in some Crohn's patients, either coincidentally or causally. Much more research is needed to draw definitive conclusions.

MAP is shed in manure and can survive (but not multiply) in the environment for many years. For the organism to reproduce and multiply, it needs a live host. Another means of transmission is through milk. A third route is in utero: a fetus may acquire the infection from its infected dam even before it hits the



Photo source: <http://www.paratuberculosis.net/johnes.php>

ground. Young animals are the most susceptible to infection so oftentimes dams or other adult animals infect their offspring.

Testing is the only way to verify the disease on the farm. It is recommended to work with your veterinarian. Certain tests are not effective for testing all species. It is difficult to identify in animals that are subclinical. It may determine whether or not MAP is present on the farm and its extent.

Manure, environmental (grass, soil, water) or tissue samples may be tested. With cultures MAP is very slow growing and may take seven weeks or more to grow to detectable levels; other testing is more rapid. Sampling may be pooled (up to five animals). If results return positive then the individuals will need to be tested.



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Johne's is one of those diseases where an ounce is worth a pound of cure. Prevention is key. Here are some tips, which should be in place already.

- ♦ Have a quarantine area if you purchase any animals. Hold animals there for 4-6 weeks for observation.
- ♦ Ask questions about the herd or flock health and testing, specifically Johne's, and how recently was testing done.
- ♦ Look at body condition and thriftiness in older animals when making a purchase.
- ♦ Beware of borrowing or leasing breeding animals.
- ♦ Keep birthing areas clean.
- ♦ Keep young and old animals separated as much as possible. Artificially rear (bucket feed) young if necessary.
- ♦ Cull sick or diseased animals.

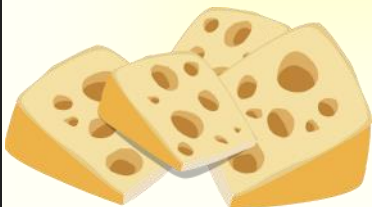
There are lots of resources out there to assist farms. If you have cattle the Animal Diagnostic Center has a program to help set up management practices for you and your veterinarian to work through: <https://ahdc.vet.cornell.edu/programs/NYSCHAP/>

Here is another great resource for information. This website is run by the University of Wisconsin and covers all domestic species susceptible to the disease. <http://www.johnes.org>

DAIRY TRIVIA

Question: Can a person still enjoy dairy even if they are lactose intolerant?

Answer: Yes. Lactose intolerance doesn't mean dairy intolerance. You can still enjoy dairy & benefit from its essential nutrients even if you have trouble digesting it. Lactose-free milk is one of the best options - it's real milk, without the lactose. Low-fat cottage cheese, Swiss and mozzarella cheeses, and yogurt, are other dairy foods naturally lower in lactose.



Upcoming Webinars:

"Monitoring & Managing Metabolic Diseases in the Transition Cow"

June 12, 1:00 - 2:00 p.m.

Presented by:

Daryl Nydam, DVM, Cornell University

<http://hoards.com/flex-309-Webinars.html>



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By: Timothy X. Terry

Regional Strategic Planning Specialist, Harvest NY

Millions of dollars in buildings, equipment, and livestock are lost each year in farm - related fires. These tragedies represent not only a loss of livelihood, but also various negative impacts on the local communities that service them. Moreover, there's no figure that can adequately value the loss of human life, especially if that loss is the farm operator and/or majority family breadwinner.

June is Dairy month, and we should be doing all we can to protect the dairy – or any agricultural business, for that matter. What follows is a list of things you and your crew can do to minimize the risk of a barn fire.

- ✓ A clean barn is a safe barn – enough said.
- ✓ Inspect the barn, shop, storage, etc. annually and have a licensed tradesman repair or replace any damaged or worn mechanicals.
- ✓ Outlets should be regularly examined and kept free of dust and cobwebs.
- ✓ Extension cords are for temporary use only and should be kept in good condition with fully grounded plugs.
- ✓ Check fans and electrical panels for dust and cobwebs.
- ✓ Provide a safe designated area for smokers with an easy, reliable way to extinguish butts – i.e. - strategically placed buckets of sand.
- ✓ Check fire extinguishers monthly, or at least semi-annually. This could be paired with changing the batteries in smoke detectors – when the time changes in spring and fall.
- ✓ Map out locations of extinguishers so you know where they are in an emergency.
- ✓ **NEVER** refuel hot engines inside a building.
- ✓ Keep oily rags in a metal, fire-safe container away from any heat sources.
- ✓ Light fixtures should have explosion-proof covers.
- ✓ Clean out cobwebs and hay chaff which can act



Barn Fire Safety Checklist

Mrs. O'Leary's Cow may have gotten a bad rap but the folktale reminds us fire safety is an important part of farm life. People, animals, and property are in danger when fire breaks out on the farm. Inspect your barn and outbuildings for fire hazards to reduce the risk of tragic loss.

- ✓ Heat lamps and space heaters are kept a safe distance from anything that can burn.
- ✓ Heaters are on a sturdy surface and cannot fall over.
- ✓ Electrical equipment is labeled for agricultural or commercial use.
- ✓ All wiring is free from damage.
- ✓ Extension cords are not used in the barn.
- ✓ Lightbulbs have covers to protect them from dust, moisture, and breakage.
- ✓ Damage is identified quickly and repairs are completed with safety in mind.
- ✓ Dust and cobwebs around electrical outlets and lights are removed.
- ✓ Oily rags are stored in a closed, metal container away from heat.
- ✓ Feed, hay, straw, and flammable liquids are stored away from the main barn.
- ✓ The barn is a smoke-free zone.
- ✓ Exits are clearly marked and pathways are clear.
- ✓ Fire drills are held frequently with everyone who uses the barn.
- ✓ Workers are trained to use fire extinguishers.
- ✓ Everyone in the barn knows personal safety is the first priority if a fire breaks out.
- ✓ Hazard checks take place on a set schedule.

Required Equipment

The following safety equipment may be required by local building codes and will help protect your barn. Install and maintain:

- ABC-type fire extinguishers near every exit and within 50 feet from any point in the barn.
- Fire alarm system
- Sprinkler system
- Carbon monoxide detection system



Talk with your local fire department to address safety concerns unique to your farm.

Go to www.nfpa.org/farms to learn more about fire safety on the farm.

Name of Organization Goes Here

Contact Information Goes Here

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like a high speed pathway for fires to spread.

- ✓ If you have a dry hydrant on the farm make sure your local fire department knows its location. Make sure it is always accessible – free of brush, equipment, snow, etc.

For more information check out www.nfpa.org/farms.

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Pests to Watch in June: Black Cutworms and Slugs

By: Mike Stanyard

Spring was not a good start for growers in NWNy. Above average rainfall and cold temperatures delayed most field activities until mid-May. With the current weather and planting conditions, I am trying to look ahead to June and predict what pests could be an issue. This is based on past experience and what is happening in the Midwest and surrounding states.

Black Cutworm. One of the most feared early pests of the corn-growing region is the black cutworm (BCW). This pest overwinters in the Gulf States and migrates north on air currents and storms each spring.

Many states use pheromone traps to catch BCW moths to monitor when adults begin migrating north. These traps are then monitored closely to determine when moths are arriving in mass numbers. The timing of these intense flights can be used to predict when larval plant cutting should occur. Research has found that when 9 or more moths are caught over a 2 day period it is considered an intense capture and if degree days (base 50° F) are accumulated starting from this day, cutting should begin at approximately 300 degree days. However, just because large numbers of BCW's are flying into an area does not indicate if BCW will be a problem or in which fields they might be a problem. But it can help determine when to start scouting for cutworm damage in the field.

We did put out some BCW traps in the region this spring to monitor their first arrival. Remember, these traps only catch males. We had intense BCW captures in the NWNy from April 26 through May 10.

The best approach to cutworm management is to scout emerging corn every 2-3 days and watch for signs of cutworm feeding. Pay close attention to fields with conditions that favor cutworm outbreaks. These conditions include planting into cover crops, weedy fields and fields previously in pasture or sod. Continue to scout corn for cutworms until the six leaf



Photo source: Mike Stanyard

stage. After V6, the corn is usually too big for the larvae to cut. Remember, BCW are nocturnal feeders and you will not usually see them during the day. Look for signs like wilted, cut, or missing plants. The larvae will be close by hiding under soil clods, stones, residue, or in cracks in the soil. Dig up the soil around a freshly cut plant and you should be able to find the culprit! Treatment is justified if 5% or more of the plants have been cut. You can view our video on how to scout for BCW at <https://vimeo.com/130331770>.

Slugs. Unfortunately, slugs will thrive in wet cool springs. I have found four different slug species that will feed on corn and soybeans seedlings. The gray garden slug is the most common slug we have but the dusky, banded and marsh can also be present at the same time. Most slugs overwinter in the egg stage. Eggs are about 1/8" in diameter and are clear to white in color. They are laid in clumps of 10 to 20 at a time and are placed in a cool moist place such as under residue, clumps of soil, rocks and logs. When the eggs hatch in May the young juveniles are voracious feeders. This is the most damaging stage, as these slugs need as much plant vegetation as possible to grow larger and mature.

Slugs are nocturnal which means they hide most of the day and come out to feed at night. They prefer cool and moist conditions and are most active between 63 and 68 degrees F. Most of their damage goes unnoticed as they feed down in the seed furrow

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especially when there is lots of surface residue. Young emerged seedlings have irregular holes in the leaves and have a tattered appearance. The accumulation of surface residue under long-term no-till in combination with favorable environmental conditions can be devastating. A telltale sign that slugs have been present feeding are the silvery dried slime trails that they leave behind.

Increasing tillage is one way of reducing favorable habitat for slugs. However, this is not an option for no-tillers. Strip tilling may be an option for removing residue from the seed furrow as well as the use of trash wheels and residue managers. Others are running a vertical tillage tool just prior to planting to expose soil and increase soil temperature to get the crop out of the ground faster.

Planting as early as possible can help avoid slug damage but that was not an option this year! Baits with the active ingredient metaldehyde such as Dead-line MP (mini pellets) have been very effective. Recommendations of 10 pounds/acre will cost you

around \$20. These products can be put out with a grass seeder with a goal of 4 to 5 pieces per square foot.



Performance of Northwest NY Region Dairy Farm Businesses in 2016 – Preliminary Results

By: John Hanchar and Joan Petzen

Summary

- Milk receipts per hundredweight (cwt.) fell 6.1 percent to \$17.37 per cwt. when compared to 2015.
- In 2016, the operating cost of producing a cwt. of milk was \$15.57, a decrease of 2.8 percent relative to 2015.
- As of May 10, 2017, preliminary results indicate that Northwest New York region (NWNy) dairy farms in Cornell University Cooperative Extension's Dairy Farm Business Summary (DFBS) Program achieved lower levels of profit in 2016 compared to 2015 -- for example, in 2016, the rate of return on all assets without appreciation averaged 0 percent compared to 1 percent in 2015.

Introduction

The results reported here represent averages for the following.

- 34 NWNy dairy farms cooperating in 2016, preliminary, data accessed May, 10, 2017
- 35 NWNy dairy farms cooperating in 2015, preliminary, data accessed May 10, 2016

Size of Business

- The average number of cows per farm for 2016 to date is 1038, compared to 920 in 2015.
- Worker equivalents per farm are 21 and 20 for 2016 and 2015, respectively.
- Tillable acres totaled 1,990 and 1,715 for 2016 and 2015, respectively.

Rates of Production

- Milk sold per cow averaged 25,890 in 2016 compared to 25,092 in 2015.
- Hay dry matter per acre fell 12.8 percent to 3.14 tons, while corn silage per acre fell from 17.4 to 15.9 tons.



Income Generation

- Gross milk sales per cow decreased from \$4,639 in 2015 to \$4,497 in 2016, a change of negative 3 percent.
- Gross milk sales per hundredweight (cwt.) fell from \$18.49 to \$17.37.

Cost Control

- Dairy feed and crop expense per cwt. of milk fell from \$8.20 in 2015 to \$7.36 in 2016, a decrease of 10.2 percent.
- In 2016, operating cost of producing a cwt. of milk was \$15.57, a decrease of 2.8 percent relative to 2015.

Profitability

- Net farm income without appreciation per cwt. of milk averaged \$0.13 in 2016 compared to \$0.75 in 2015.
- Rate of return on equity capital as a percent without appreciation averaged negative 1.7 percent compared to 0.1 percent in 2015.
- In 2016, the rate of return on all assets as a percent without appreciation was 0 percent compared to 1 percent in 2015.

Final Thoughts

Owners of dairy farm businesses cooperate in Cornell University Cooperative Extension's DFBS Program for the purpose of identifying strengths and weaknesses by comparing their results to results of other cooperators. Are you interested in realizing the benefits of DFBS participation? Call John Hanchar – for contact information, please see information at the front of this newsletter.

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46K Rears
327,000 Miles
2005 MACK VISION CX613; 360 HP Mack E7; 13-Spd.; Tandem Axle; Engine Brake; 22.5 Tires; Alum./Steel Wheels; 186" WB; 14,000# F/A; 46,000# R/A; Very Clean, Heavy Spec Daycab Tractor w/Low Miles; Air Slide 5th Wheel; 75% Rubber; 327,882 Miles; Stk. #4833 - \$29,900



24 ft. Auto.
NON-CDL
2008 PETERBILT 330; PACCAR PX6; Automatic; Hydraulic Brakes; Leaf Spring Susp.; 24' Van w/Liftgate; 8,000# F/A; 18,000# R/A; 256" WB; 350,200 Miles; Stk. #5313 - \$19,900



46K Rears
475 HP CAT
2006 PETERBILT 378; 475 HP CAT C-15; 18-Spd.; Tandem Axle; Engine Brake; 22.5 Tires; Alum. Wheels; 172" WB; 12,000# F/A; 46,000# Full Locking Rear; New Recaps On Rear; 380,024 Miles; Stk. #4563 - \$54,900



CAT 475 HP
46,000# Lockers
2005 WESTERN STAR 4900; 475 HP CAT C-15; 18-Spd.; Tandem Axle; Engine Brake; 4.30 Ratio; 22.5 Tires; Alum. Wheels; 244" WB; 14,600# F/A; 46,000# Full Locking Rears; Very Good Condition; Double Frame; 545,068 Miles; Stk. #3636 - \$39,900



22 ft. Alum. Dump
46,000# Lockers
2001 PETERBILT 357; 425 HP CAT C12; 8LL Trans.; Five Axle; Engine Brake; 22.5 Tires; Alum. Wheels; 290" WB; 18,000# F/A; 46,000# Full Locking Rears; 5-Axle Dump Truck w/Double Frame; (2) Seizable 5,000# Lift Axes; 22" Alum. Box w/64" Sides; 842,287 Miles; Stk. #5348 - \$54,900



515 HP
46,000# Lockers
2006 FREIGHTLINER FLD120; 515 HP Detroit 14L; 8LL Trans.; 22.5 Tires; Alum./Steel Wheels; 191" WB; 14,600# F/A; 46,000# Full Locking Rears; Rear & Challenger Vacuum Pump; Dual Exhaust & Air Cleaners; 426,238 Miles; Stk. #4801 - \$32,500



20 ft. High Side Southern Dump
1997 MACK RD690S; 300 HP Mack E7; 10-Spd.; 20" Steel Box; 22.5 Tires; Spoke Wheels; 250" WB; 18,000# F/A; 44,000# R/A; Double Frame; Box Has High Side, Divider & Tarp; 147,222 Miles; Stk. #5312 - \$32,500



24 ft. Alum. Dump
2000 MACK RD600; 400 HP Mack E7; 8LL Trans.; 24" Length Alum. Body; 2-Way Tailgate w/Coal/Grain Chute & Tarp; 22.5 Tires; Alum./Steel Wheels; 263" WB; Tri-Axle; 20,000# F/A; 46,000# R/A; Good Running Dump Truck w/20,000# Air Lift Axle; Good Rubber; 439,006 Miles; Stk. #5108 - \$39,500



Choice Of (2) Long Chassis
2003 & 2000 FREIGHTLINER FL112; 430 HP CAT C12; Engine Brake; 10-Spd.; Air Lift 3rd Axle; Double Frame; 18,000# F/A; 46,000# R/A; 270" WB; 20' Flatbed w/Drywall Pallet Fork Boom - CALL



18K/44K Rears
460 HP
Tri-Axle
2004 MACK GRANITE CV713; Tri-Axle Daycab; Mack 460 HP; 18-Spd.; 24.5 Tires; Alum. Wheels; 250" WB; 18,740# F/A; 44,000# R/A; 18,000# Lift Axle; 18" Frame; 168" CT; 550,090 Miles; Stk. #5356 - \$47,900



24K/40K Rears
Tandem Tandem
2006 PETERBILT 357; 475 HP Cummins ISX; 8LL Trans.; 22.5 Tires; All Steel Wheels; 332" WB; Tri-Axle; 24,000# F/A; 40,000# R/A; 39' Length; Tandem Tandem; Double Frame; National 1160/39 Crane; Hitch w/Air Hookups; 23' 6" Deck; Air Lift Axle Behind Cab; 24" Bunk; Can Separate Drive From Chassis; 27' 9" Frame Behind Cab; 230" CT; 388" Bridge; 63,351 Miles; Stk. #5361 - \$38,900



Cheap 20K/46K Daycab
1994 MACK CL713; 400 HP Mack E7; 18-Spd.; 24.5 Tires; All Steel Wheels; 205" WB; 20,000# F/A; 46,000# Full Locking Rears; Spring Susp.; Wetline System; 519,795 Miles; Stk. #4812 - \$15,000



20K/46K Rears
Allison Auto.
2005 PETERBILT 357; 370 HP CAT C11; Allison HD4560P; 20,000# F/A; 46,000# R/A; Hendrickson Susp.; 216" WB; 144" CT; 17 ft. Usable Frame Behind Cab; 5.38 Ratio; Lockers; Front Alum. Floats; 134,000 Miles; Stk. #4893 - \$65,900



Rebuilt Engine
19 ft. Alum.
1998 FREIGHTLINER FLD120; 470 HP Detroit 12.7L; 8LL Trans.; 20,000# Lift Axle; 19 ft. Alum. Body; 24.5 Tires; Spoke Wheels; 258" WB; 20,000# F/A; 46,000# Full Locking Rears; Rear Double Frame & Tarp; Complete In-Frame Rebuild @ 322K w/Paperwork; 378,222 Miles; Stk. #5261 - \$31,000



20K/46K Rears
CAT 475 HP
2004 KENWORTH C500; 475 HP CAT C15; 18-Spd.; 4.88 Ratio; 24.5 Tires; Alum. Wheels; 340" WB; Tandem Axle; 20,000# F/A; 46,000# Full Locking Rear; Double Frame; 100,000 lbs. Tulsa Winch & 22' Gin Poles; 9' Wide At Tail Roller; Can Separate Deck/Winch From Chassis; 26 1/2" Frame Behind Cab; 264" CT; 75% Rubber; 134,498 Miles; Stk. #5151 - \$39,500



Rollback With Fresh Engine
1999 INTERNATIONAL 4900; 220 HP DT466E; 8LL Trans.; 19' Length; 22.5 Tires; 215" WB; Single Axle; 13,220# F/A; 20,000# R/A; Double Frame Rollback Truck w/Winch; Engine Just Gone Through w/New Piston Sleeves & Bearings; 19' Long Deck by 100" Wide; 270,870 Miles; Stk. #5072 - \$24,500



20,000# Front
Heavy Spec
2006 INTERNATIONAL PAYSTAR 5600; 450 HP Cummins ISX; 13-Spd.; Engine Brake; 4.30 Ratio; 24.5 Tires; 240" WB; Tandem Axle; 20,000# F/A; 40,000# R/A; Clean, Double Frame Winch Truck w/Bradford Winch; 15'x8' Deck w/Tail Roller & 5th Wheel Hitch; Can Separate Winch/Deck From Chassis; 19" Frame Behind Cab; 180" CT; 384,977 Miles; Stk. #5311 - \$39,900



18K/46K Rears
Allison Auto.
2002 FREIGHTLINER FLD112; 370 HP Cummins ISM; Allison Auto. Trans.; Tandem Axle; 4.89 Ratio; 315/80R22.5 Tires; All Steel Whels; 170" WB; 18,000# F/A; 48,000# R/A; Double Frame Tractor w/Wetline System; 306,867 Miles; Stk. #5297 - \$32,900



18 ft. Flatbed
No Rust
2002 INTERNATIONAL 4900; 300 HP International DT530; 10-Spd.; 18" Flatbed x 96" Width; 5.29 Ratio; 22.5 Tires; 208" WB; Tandem Axle; 12,000# F/A; 40,000# R/A; Clean, Low Mile Flatbed; Rubber 75%; 266,335 Miles; Stk. #5355 - \$21,900

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Make Communication a Priority

By: Libby Eiholzer

Over the past 50 years or so, many dairy farms have undergone significant growth. Farms that used to employ a workforce of only a handful of people with the same last name now look outside their families for additional workers. In the long run, this equates to fewer hours spent working directly with cows and equipment and more hours spent managing the people who work with the cows and equipment. Unfortunately, that's not always as easy as it sounds; you may have noticed that the approach you use with your bovines doesn't work as well with your humans.

What language do cows speak? English? Spanish? Chinese? When I've posed this question during animal handling trainings, the response I often get is "all of the above!" It's true, cows seem to respond to people in the same manner no matter what language they speak, and will listen without judgment to anything you have to say. Whether you realize it or not, you communicate with your cows using body language more than speech. And while your people surely do pay attention to body language, the words you use and the way you say them are more important than you may have realized.

What's more, your employees *want* you to talk to them. When I translate for a meeting between English-speaking managers and Spanish-speaking employees, frequently the first question that the employees have for their boss is "How am I doing?" Though the boss may have just finished going through a list of things that the team is doing well and some that need improvement, employees crave one-on-one feedback from their boss.

As the growing season gets going, many managers spend more time on a tractor and less time on the ground working with employees. Don't forget to make time to communicate with your team! Since you know it's harder to fit in the time for sit-down meetings, be creative: send out a group text message, hold a quick meeting over coffee in the break room, or write a note to a group of employees who deserve



congratulations on a job well done. Employees tend to become disgruntled when they don't know what's going on, so making the effort to keep them up-to-date on farm happenings and providing them with feedback on their performance can keep everyone happier in the long run.

DAIRY TRIVIA

Question: Why is milk pasteurized?

Answer: *Pasteurization kills harmful bacteria found in raw milk. All milk intended for consumption should be pasteurized - it's a matter of food safety.*

The NACHURS logo features the word "NACHURS" in a bold, sans-serif font, with a green swoosh underneath. Below the logo, the text reads: "Always the Innovator, Never the Imitator™". Further down, it states: "Since 1946, NACHURS® has been helping farmers achieve higher yields and profits, offering premium in-furrow starters, foliar nutrition, and micronutrients. Contact us today to learn about the latest technologies NACHURS® has to offer." At the bottom, there are four logos: "bio-K", "rhyzo-LINK", "aqua-TECH", and "YaraVita PRO-COTE". Below these logos, the text says: "visit us online: www.nachurs.com or call: Wayne Osterhoff (716) 248-0188". At the very bottom, in small print, it says: "© 2013, NACHURS ALPINE SOLUTIONS. All rights reserved."

Environmental Conservation Management Practices Grant Funding Available

Grant funds are available for business planning, development or update to Comprehensive Nutrient Management Plans, and the design of environmental conservation practices, through the Dairy Acceleration Program.

The Dairy Acceleration Program (DAP) is an initiative of Governor Cuomo in partnership with the NYS Department of Agriculture and Markets and the NYS Department of Environmental Conservation designed to enhance profitability of New York dairy farms while maintaining a commitment to environmentally responsible dairy farming. The program is coordinated through Cornell PRO-DAIRY and in collaboration with Cornell Cooperative Extension.

Environmental planning funds may be used for the development or update of Comprehensive Nutrient Management Plans (CNMP) and the design of eligible best management practices (BMPs) identified in the farm CNMP, including the construction inspection and as built certification for that practice. Farms must have lactating dairy cattle and be shipping milk. Dairy farms and heifer boarding operations under the medium CAFO size are eligible to apply for CNMP funds. Dairy farms



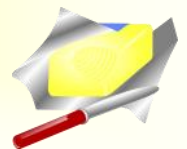
and heifer boarding operations under the large CAFO size are eligible to apply for design funds.

Application information is available online at prodairy.cals.cornell.edu/dairy-acceleration or contact Caroline Potter, PRO-DAIRY, 272 Morrison Hall, Ithaca, NY 14853 at (315) 683-9268

DAIRY TRIVIA

Question: How many pounds of milk does it take to make one pound of butter?

Answer: It takes 21 pounds of milk to one pound of butter.



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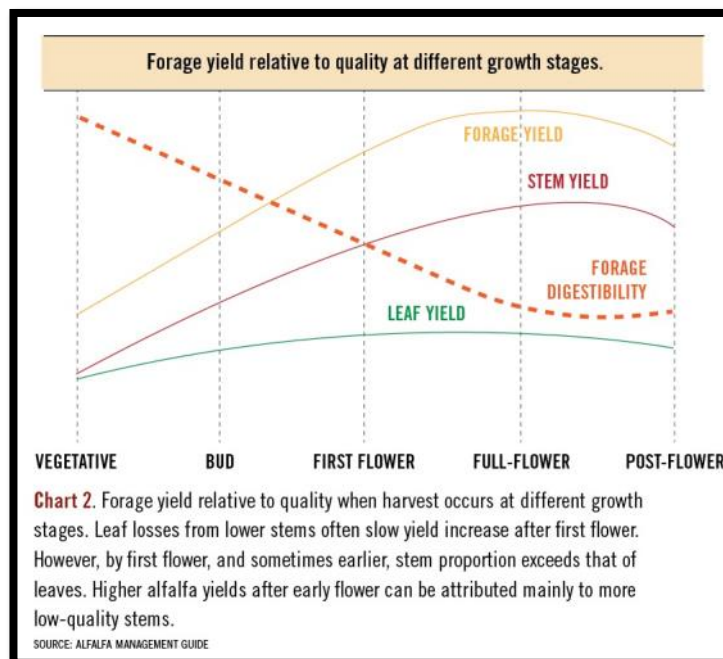
By: Jodi Letham

It has been a cold, wet spring for us. Due to weather most field activities started mid-May. During the month of May I was out taking alfalfa, alfalfa/grass, and grass stand height measurements to determine 1st cutting for peak quality. Alfalfa weevil came early this year and we are concerned with the potential damage that might occur in 2nd harvest. An insecticide application may be needed to prevent loss of quality and yield. This may also provide an opportunity for you to get more nutrients on your field to help improve your forage quality.

Producing consistent “dairy-quality” haylage varies throughout the season and from year-to-year depending on weather conditions. Harvesting alfalfa at the right stage of growth is one of the best tools under the grower’s control to determine both yield and quality. However, a fundamental reality of alfalfa production is that yield and quality are inversely related. Alfalfa harvested at immature growth stages (i.e., pre-bud or early bud) has high forage quality but suffers in yield. Conversely, alfalfa harvested in the bloom stage is higher yielding but has lower forage quality. Being able to achieve your maximum return on investment requires a difficult balancing act considering the benefits of early cutting for forage quality against the negative effects of early cutting on total yield and stand longevity.

Plant energy reserves

The amount of regrowth of perennial forage legumes after every harvest is based on energy reserves (food) stored in the taproots and crowns of the plants. Harvesting at the bud stage has allowed producers to increase cuttings per year, increase production, and improve the quality of their forage. However, in order to continuously harvest early, producers should have optimum levels of soil pH, phosphorus, potassium, sulfur and micronutrients to help the plant produce enough energy reserves (food) for continued growth and development. Broadcast or foliar fertilizer applications can be made to help supply the plant with its nutritional needs. Nitrogen applications



may be needed in pure grass stands to help promote regrowth and increase yield.

Cutting schedule

Forage quality, yield and stand persistence are all taken into consideration in the development of a profitable harvest management program. Many have re-evaluated current harvest strategies due to increased awareness of the nutritional value of high quality alfalfa in relation to the potential savings of energy and protein supplement. Harvest schedule is based on forage quality desired by the producer. When harvesting for high quality and yield the second cutting should occur 30 days after first cutting, following a 30-day interval after that. Longer cutting intervals are recommended if stand persistence is desired.

Dry versus liquid fertilizer application

The high cost of seed, fertilizer, and chemicals make corn an intense crop to manage for top yields and economic returns. Starter fertilizers help with the development of emerging seedlings by supplying essential nutrients in accessible locations near the roots. Plant development and yield is influenced at an early growth stage, making it important for quick crop establishment. Producers should consider costs, ease and convenience of application, and potential

plant response when making fertilizer management decisions. Dry fertilizer blends can be ground applied as a broadcast; applied at planting (2x2); or side-dressed and cultivated into the soil. Producers can create custom blends to fine tune their crop fertility program and possibly improve crop production efficiency. Liquid fertilizers have become more popular in recent years. They can be broadcast, banded or side-dressed mid-season and foliar applied. The differences are liquids are more spatially mobile throughout soil water solution versus a placed granular, banded granular fertilizer

can be hot due to salt content, nutrient content is more consistent In liquid versus each individual granule, and equipment cost to convert to handle liquid fertilizer can be difficult. As far as crop response, there is no agronomic difference in the efficiency of liquid and dry fertilizer when the same rate and placement is used under adequate growing conditions. Table below adapted from Michigan State University.

For more info please visit: http://msue.anr.msu.edu/news/all_fertilizers_are_not_created_equal

Liquid Advantages	Dry Advantages
Ease of handling & application (once setup)	Cheaper in bulk
Blending ease	Storage (doesn't settle/salt out)
Uniform application	More effective for heavy pre-plant applications
Starter & in season application	Slow release options
Blend with crop protection products	



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JUNE 2017

- 4 **Wyoming County Agri-Palooza**, 12:00 p.m. - 4:00 p.m., Southview Farm, 5073 Upper Reservation Road, Castile
- 8 **Small Grains Management Field Day**, 9:30 a.m. - 12:00 p.m., Musgrave Research Farm, 1256 Poplar Ridge Road, Aurora.
For more information: <https://fieldcrops.cals.cornell.edu/news-events/>, DEC & CCA credits will be requested.

JULY 2017

- 6 **Seed Growers Field Day**, 9:00 a.m. - 12:00 p.m., NYSIP Foundation Seed Barn, 791 Dryden Road, Ithaca. For more information contact: Margaret Smith at 607-255-1654 or mes25@cornell.edu, DEC & CCA credits will be requested.
- 11-15 **Yates County Fair**, 2370 Old 14A, Penn Yan. For more information: www.yatescountyfair.org
- 13 **Aurora Farm Field Day**, 9:45 a.m. - 3:00 p.m., Musgrave Research Farm, 1256 Poplar Ridge Road, Aurora. DEC & CCA credits will be requested. For more information contact: Jenn Thomas-Murphy at: 607-255-2177 or jnt3@cornell.edu
- 17-22 **Genesee County Fair**, 5056 East Main Street Road, Batavia. For more information: www.gcfair.com
- 18-22 **Livingston County Hemlock Fair**, 7370 Fair Street, Hemlock. For more information: www.hemlockfair.org
- 19-22 **Seneca County Fair**, 100 Swift Street, Waterloo. For more information: www.senecacountyfairny.com
- 24-29 **Orleans County 4-H Fair**, 12690 State Route 31, Albion. For more information: www.orleans4-hfair.com
- 26-30 **Ontario County Fair**, 2820 County Road #10, Canandaigua. For more information: www.ontariocountyfair.org



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