

Cattle Call

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Keeping Things in Balance

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Life is a balancing act and so is the business of being a successful seedstock breeder. Today's emphasis is on the use of EPDs to make breeding decisions. We also have DNA technology to enhance the accuracy of EPDs. As an animal scientist, no one believes more strongly in EPDs and the value of DNA technology than I do. If an economically relevant trait can be accurately described with data, we must take advantage of the opportunity and use it. However, there are a number of physical or type traits that we have not yet described with EPDs. Perhaps in the future we will be able to do so, but for the time being we have to rely on visual calculation. This is why universities offer livestock evaluation courses—to teach our students how to evaluate those traits and balance them with data in making wise selection decisions within a given production and marketing environment.

We often refer to these physical traits as “functional” traits, because many of them may affect the animal's function and longevity in the herd. Examples are skeletal structure (feet, legs, shoulder, spine, etc.), mammary structure (udder attachments, teat size), sheath and prepuce structure, disposition/temperament, body capacity, fleshing ability, etc. Other traits include those that are valued in market progeny, such as muscle expression and degree of fatness. In recent years, EPDs have been developed that relate to some of these traits, such as docility (disposition), stayability (longevity), ribeye area, and fat thickness.

Visual evaluation still has a place and needs to be factored into the balancing act. Astute breeders have the ability to combine EPDs and physical traits into a near-ideal package that can meet the needs of their customers. In doing so, it is imperative to understand the needs of the customer base. Each breed has only a percentage of breeders who can consistently accomplish this over time. Some may not have a complete grasp of how to use EPDs effectively. Others may not have a full understanding of how to visually evaluate cattle for physical traits. It has been my observation that seedstock breeders have become much more accomplished at using EPDs in recent years. However, the ability

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to evaluate physical traits may have declined, especially among new entrants into the business who have had little or no previous experience in live animal evaluation.

If a customer gives you an order for bulls to be used on heifers and you send him bulls that are out of bounds for birth weight and/or calving ease direct EPD, resulting in a disastrous calving season, he is not going to be happy to say the least. But, by the same token, if a customer gives you an order for stout, muscular, capacious bulls capable of siring thick, heavy-muscled, high-performing steers for his feedyard customers, he is not going to be happy if you send him frail, light-muscled, hard-doing bulls. No customer would be satisfied if he were sold bulls having structural defects such as unsound feet and legs that would impair their breeding performance and longevity in his herd.

Montana State University recently conducted a study on the heritability of physical/type traits using data from 21,052 females in ABS Global's system for scoring progeny of A.I. sires. They found the following traits were moderately to highly heritable: muscle, frame score, body capacity, femininity, rear leg set, foot and pastern angle, udder depth, udder attachment, and teat size. The results indicate it is possible to change these traits through accurate selection and culling strategies. They also found that certain correlated changes may occur. For example: selection for females with tighter udders will result in an improvement in udder attachments and a decrease in teat size; conversely, intense selection for femininity may result in cows that lack muscle and capacity.

Previous research has revealed other correlated changes that may occur when selecting for certain traits. Intense selection for increased marbling may be correlated with increased carcass fatness and decreased retail product yield. Intense selection for increased muscling and decreased fatness can negatively impact marbling and increase ribeye area beyond industry specifications. Recent observations would suggest that long-term selection for low birth weight may decrease muscling in cattle and result in increased calving difficulty in replacement heifers due to reduced pelvic area. Some of these antagonistic relationships are not strong, but intense selection over time for certain traits could certainly have a negative effect on other economically important traits.

Throughout my career, I have been actively involved in selecting seedstock for my own herd, for the university herd, and for other breeders. I admire and embrace the breeding

philosophy of one of the country's most successful seedstock producers, who I believe is right on target when he says, "My breeding objective is to position my EPDs where I need them to be and then produce a type of cattle within that EPD framework that fits the needs of my customer's." The breeding of cattle is becoming more and more science-based, which is good. However, there is still a bit of art involved in the breeding of superior cattle. Data is extremely important, but it isn't the total answer. A measure of what the late Prof. Herman Purdy at Penn State referred to as "stockmanship" is still needed in order to keep

Best Management Practices for Fly Control

Maury Karcher

Livestock AoE, SouthEast MI

It is the time of the year all livestock producers should be thinking about fly management strategies. There are several management decisions that can be made that will greatly decrease fly populations in and around livestock facilities. Fly control should be viewed as a good neighbor policy plus having a positive economic impact on your livestock operation.

There are four (4) main types of flies that livestock producers need to be aware of and that most likely have the greatest impact on your operation. If managed properly you will make positive inroads to a good fly management program. Face, Horn, Stable, and House Flies are the most common flies we have around the farmstead. The important issue is that you recognize a fly is not just another fly. If you misidentify the fly you wish to manage your success for that decision will diminish dramatically.

The following is a brief description of each fly and where they are more likely to reproduce and attach themselves to the host animal.

Stable Fly: Stable flies require a combination of organic matter, animal waste, and moisture to reproduce. They can reproduce in about 24 days. They are blood feeders that can have an economic impact with no more than 20-25/Animal Unit (AU). This fly can cause animal stress that will reduce animal weight up to 20-25lb/AU. This fly will overwinter in undisturbed and protected areas around buildings and feed bunks. An adult will lay approximately 800 eggs in groups of 25-30 after a blood meal. Their favorite location is on the lower legs.

Control: The best management practice to control this fly is sanitation, sanitation, and more sanitation. In other words if you can break the cycle of egg production you can make rapid improvement on controlling fly numbers, plus starting early in the growing season is always helpful. The best way to do this is by removing spilled feed, cleaning barns every 7-10 days, and minimizing water spillage. Another method is use of dust bags (located in strategic areas), baits, larvacides, and sticky tapes. Fly tags can be very useful provided you don't continue to use the same kind of insecticide every year. My recommendation is to either use a combination pyrethroid/organophosphate tag or if using only one of those insecticides, rotate the type of tag used each year. Another newer method is using parasitic wasps. This small insect will attack fly larvae and prevent larvae from hatching. This is an effective tool provided you use the right parastoid and you don't wait until the stable fly population is out of control. There are several companies that sell this product and for information you can contact your local Extension office.

Horn Flies: The Horn fly is one of the most costly of all flies we in the livestock industry face. This fly is located on the shoulder area of cattle and when reaching thresholds of 100-200/AU will decrease animal performance. Fly numbers of 500/animal can remove up to ½ lb of blood per day. In addition, we know that animal's performance in feedlots can be impacted by 10-15 added lb of gain per week if fly numbers are left uncontrolled.

Control: Controlling the Horn fly starts in the pasture or through the manure that is deposited by grazing or feedlot animals. Rabon or Alstoid are effective products that can be added to your mineral program that will have a positive result on reducing Horn fly numbers. In addition, fly tags, backrubs, and pour-ons can be effective tools in reducing



fly numbers. In each case, one has to look at cost and management style to determine which of these tools you should utilize. Start early- in Southern Michigan, May 1 and as you go North, around the middle of May.

House Flies: House flies are more of a nuisance than they are an economic impact on livestock. Like Stable flies, House flies require manure, organic matter, and moisture to reproduce. Adults live 3-4 weeks and can produce up to 1000 eggs each. So cleaning barns every 7-10 days and sanitation can go a long ways in controlling or reducing fly numbers. The biggest concern with this fly is the spreading of disease and the impact on your neighbors. House flies are generally seen more around buildings than in pastures and do not have sucking mouth parts like the Stable or Horn fly.

Control: Control measures for this fly are very similar to the Stable fly. Most of these flies depend on organic matter to reproduce and breaking the cycle is accomplished by using sanitation methods and keeping the barns as clean as possible. Minimizing water and feed spillage can be very helpful in controlling this insect. I would note that when talking about cleaning barns that means cleaning corners and areas that you might not reach with skid loaders or power equipment. Once again a parasitic wasp is an option along with larvacides, sticky tapes, and fly baits. The important method of control goes back to starting early and using the right tools at the right time.

Face Fly: Once again this particular fly greatest impact is the spreading of disease. This fly can reproduce in pastures but not the same as a Horn fly. Face flies are especially responsible for the spreading of pink eye. Those of you that have had negative experiences with this disease know the economic impact and time commitment it takes to treat affected animals. Life cycle of this fly is between 14-21 days. This fly can also over winter in manure.

Controls: There are several things that you can do to control this fly. Insecticide ear tags, strategically placed dust bags or backrubbers, pour-ons, and some animal sprays can be effective management tools to help reduce fly numbers. Once again starting early will lead to successful reduction of this particular fly and the success of controlling this fly will depend on your management style.

In closing there are other flies that occasionally impact grazing livestock. In most cases there is no clear method of control that will reduce the impact those flies have on livestock. Many of the flies such as Heel or Horsefly are reproduced in areas of the farm that have standing water. Controlling these types of fly is nearly impossible and in many cases the only relief livestock have is finding some kind of shelter.

If your fly numbers are out of control, it may warrant a different approach to fly management. Remember to always read label direction of all products. CC

**To Learn More About
Johnes's Disease in Michigan**

cvm.msu.edu/extension/johnes

Dr. David Hawkins Honored

Dr. David Hawkins, Professor of Animal Science, was selected as the first recipient of the Howard and Lilli Camden Endowed Teaching Award. This new award was presented at the College of Agriculture and Natural Resources Honors Banquet to recognize faculty members who have demonstrated creativity and scholarship in teaching. During his 36 year career at MSU, Dr. Hawkins has taught 11 different courses, advised over 1650 students and led several study abroad courses for MSU students. He has advised beef cattle breeders and presented educational seminars in Australia, New Zealand, Canada, Brazil, Denmark and the U.S. He is completing his 10th year as the Superintendent of the National Intercollegiate Livestock Judging Contest. He has served as the faculty coordinator for the MSU Beef Cow Calf Teaching Herd since 1973 and Coordinator of the MSU Bull Test Station since 1988. He has received the CANR Distinguished Faculty Teaching Award and the CANR Distinguished Faculty Service Award. In 1999, he received the American Society of Animal Science Outstanding Teaching Award.



Scott Accepts Position with Diamond V Mills

Mr. Mark Scott has been named Technical Service Associate for Diamond V Mills, Inc. He will be based at their headquarters in Cedar Rapids, Iowa, where he

will be managing their research data and providing education and consultation to clients. He was formerly a Beef Academic Specialist in the Department of Animal Science at Michigan State University. His responsibilities included coordination of the Integrated Resource Management Program for cow-calf and feedlot operations, as well as Data Analyst and Coordinator of the Five State Beef Initiative activities in Michigan. The MSU Beef Team appreciates Mark's contribution and wishes him continued success working in the livestock industry.

MCA/MSU BULL TEST PROGRAM FOR 2005-06 ANNOUNCED

The Michigan Cattlemen's Association and Michigan State University Bull Test program dates have been set for 2005-06. Earlier this year the 17th Bull Test Sale resulted in 63 bulls averaging \$1,905 to set a new record for sale averages. The 2005-06 MCA/MSU Bull Test will again be conducted at Plank Farms near Crystal, Michigan. Delivery dates are Friday, October 14 & Saturday, October 15, 2005. Following a warm-up period and a 112 day gain test, the bulls that successfully complete the test will be sold on Saturday, March 18, 2006. Breeders who wish to consign bulls to this program should contact the Michigan Cattlemen's Association office for complete guidelines and nomination forms. Nominations will be accepted on or before September 5, 2005.

What Cattlemen Need to Know About the Revised Bovine Tuberculosis Eradication Uniform Methods and Rules (UM&R)!

Lana Kaiser, DVM

Michigan State University

Early in the 20th century (1917 to be exact!) the United States Department of Agriculture developed the Uniform Methods and Rules (UM&R) for the eradication of bovine tuberculosis (TB). Over time these rules were changed and modified to meet the changing face of the disease. The discovery of bovine TB in white tailed deer in northern lower Michigan in 1994 and the realization that cattle were being infected by wild white tailed deer, coupled with new diagnostic tests, and advanced epidemiological techniques led to the latest revision of the UM&R, which took effect January 1st, 2005. This article will highlight what cattlemen should know about the UM&R and important changes to the “old” UM&R from January 22nd, 1999.

What is the UM&R? The UM&R is a document that describes the minimum standards for the maintenance of state or zone status in the USDA bovine TB eradication program. It also describes the minimum standards for maintenance of TB-free accredited herds of cattle and bison, which will be covered in another article. The entire UM&R can be downloaded off the internet from:

<http://www.aphis.usda.gov/vs/nahps/tb/tb-umr.pdf>

Basically, these are the rules that govern efforts across the United States to eradicate bovine TB from cattle and bison herds. The rules outline which herds will be tested, when the herd will be tested, which test is to be used, and who may perform the test. The rules describe the currently accepted tests and how they are to be interpreted. The UM&R provides definitions for everything related to the bovine TB eradication effort, including definitions for herd, livestock, official eartag, geographic separation, as well as other terms important to the TB eradication program. These rules are the minimum requirements that a state must meet to comply with USDA regulations. However, it is important to remember that each state may have minimum requirements which are more strict than those in the UM&R.

What is new in 2005? The UM&R has been extensively revised to keep pace with the changing face of bovine TB infection in the United States. Although other countries have had issues with TB in wildlife infecting domestic livestock, the experience in Michigan was a first for the US. Previous versions of the UM&R did not deal with this issue. Now, the issue of risks associated with infected wildlife is extensively covered. Michigan’s situation has played an important role in the latest revision of the UM&R.

What you won’t find in the new UM&R is goats! Goat herd accreditation and reaccreditation is now covered by Veterinary Services Memorandum No. 552.8. Goat herds are no longer included in the surveillance testing for bovine TB.

You also won’t find privately owned cervids in the new UM&R. A new bovine TB eradication UM&R for privately owned cervids is in the works.

What you will find is information about livestock, feedlots, geographic separation, the gamma interferon test, performance standards for veterinarians, definitions of the different status levels, movement requirements and new accreditation rules.

Since we now know that wildlife can serve as a reservoir for bovine

TB in our domestic animals, the rules provide ways to protect cattle from exposure to infection and to protect feed sources and premises from being contaminated with the organism. For example, if a cattle herd infected with bovine TB is located in a region where bovine TB is known to be present in wildlife, the herd will not be released from quarantine until provisions have been made to mitigate potential exposure of cattle to wildlife (section J3, p16). In other words, if a cattle herd is infected with bovine TB, and it is known that deer in the region are also infected with bovine TB, provisions must be made to decrease or eliminate the risk that wildlife may contaminate the area or infect the cattle. These methods could include fencing, use of livestock guard dogs, special kill permits, etc. Another new rule is that all livestock herds within a 10 mile radius of a diagnosis of bovine TB in livestock or free ranging wildlife will be tested for TB within six months of diagnosis.

Approved feedlots and approved pens are defined and the UM&R includes regulations regarding the grazing of feedlot animals. Many of Michigan’s feeding facilities include pasture and grazing, and these were not covered in the previous version of the UM&R. Any provisions for grazing or pasturing restricted animals entering an approved feedlot must be formalized by a memorandum of understanding (called a “MOU”) and provide adequate isolation and fencing. Basically, this provides a mechanism for feedlots to utilize pastures to finish animals.

Geographic separation has been defined – let’s say you have a show herd and you have your cow herd. Do you have one herd or two herds? To be considered two different herds, they must be maintained separately and follow the rules of geographic separation. To be geographically separated there must be a minimum of 30 feet of separation, no common or shared handling facilities or equipment, no common watering or feeding equipment, and no common feed vehicles that enter herds of different status. If herds of different status are fed by the same person, the person must wear different outerwear when moving from the herd of lower status to the herd of higher status. So you can’t just call one herd separate and different, they must meet the criteria of geographic separation.

A new test has been approved for use in the TB eradication effort, the bovine interferon gamma assay (commonly called gamma interferon). This is a blood test that may be used to determine if a suspect on the caudal fold tuberculin-screening test is a false positive. This test may be used in place of the comparative cervical test. The beauty of the gamma interferon test is that it requires only one visit from the regulatory veterinarian, resulting in time saved for you and the veterinarian as well as decreasing the number of times that livestock need to be handled.

The current UM&R also includes a section concerning the veterinarians who are performing the caudal fold test. The UM&R includes a set of criteria that the veterinarians must meet to perform testing and a guideline to insure that test interpretation is accurate. Since the caudal fold test is a screening test, it is expected that there will be false positive animals on this test. Appendix C lists the performance standards expected of veterinarians doing the caudal fold test.

Appendix A of the UM&R lists the TB testing requirements for various classes of cattle and bison to move from their state of origin (Appendix B lists the movement requirements if the herd of origin in accredited free). Remember, **these are minimum requirements and the state of destination can make the rules more stringent!** For example, moving from an Accredited Free State (Ohio) to another Accredited Free State (Indiana) requires

NO TB testing for breeding animals. However, if the animal is from a Modified Accredited Advanced state or zone (In Michigan this currently includes the entire Upper Peninsula, and those counties in the Lower Peninsula not listed below) a negative TB test within 60 days is required to move out of that zone. The 60-day negative TB test will get you into Ohio (an Accredited Free State), but Indiana (another Accredited Free State) requires (as of 2/2/05) additional testing! Moving out of a Modified Accredited state or zone (in Michigan this includes all of Alcona, Alpena, Antrim, Charlevoix, Cheboygan, Crawford, Emmet, Montmorency, Oscoda, Otsego and Presque Isle counties, and those parts of Iosco and Ogemaw counties that are north of the southern most boundaries of the Huron National Forest and the Au Sable State Forest) requires a whole herd test within one year and individual negative test within 60 days. **If you plan to move cattle out of state call the state of destination for specific rules and requirements.**

For more information on bovine TB visit the state of Michigan's web site <http://www.michigan.gov/emergingdiseases> For more information on the UM&R contact the USDA office in your state.
CC

Report of Progress: Effect of Pasture and Feedlot Implant Strategy on Performance and Carcass Characteristics of Beef Steers

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The beef industry is in a state of transition from a highly segmented commodity system, to a more product-based, vertically-coordinated system. As more producers retain ownership of cattle during the various phases of production, new questions are raised regarding "optimum" production practices for a system, as opposed to maximization of return to any particular segment. A large body of research exists regarding production returns from anabolic implant use within industry segment (cow-calf, stocker, and feedlot). However, less is known about the potential interactions of implant strategy in one phase on subsequent phases. Therefore, it was the objective of this trial to determine the effects of pasture and feedlot phase implant strategies on overall performance and carcass characteristics of beef steers. This is a report of progress for the first year of a two-year study.

Materials and Methods

Eighty-four mixed breed beef steers (529 lb) were used to determine the effects of implant strategies on stocker and feedlot performance. Steers were purchased and transported to the Lake City Experiment Station, Lake City, MI on March 31, 2004. Within 24 h of arrival, steers received a 5-way modified live viral vaccine for IBR, BVD, PI₃, and BRSV viruses, a clostridial and *haemophilus somnus* bacterin, and a prophylactic antibiotic treatment (Micotil, Elanco Animal Health, Indianapolis, IN). Cattle were fed native grass hay and limited grass pasture prior to the trial. Initial body weight was determined by averaging two full-weights taken on consecutive days (May 13 and 14). The first day's weight was used to allot steers to implant treatment. Implant treatments consisted of a non-implanted control (**Control**) or 40 mg trenbolone acetate and 8 mg estradiol (**Revalor-G**; Intervet Inc., Millsboro, DE). Implants were given on day-0 of the trial, prior to moving cattle to the pastures. On day-0 all steers received a 5-way modified

live viral vaccine for IBR, BVD, PI₃, BRSV, *P. haemolytica* and *P. multocida*, a dewormer and a clostridial and *haemophilus somnus* bacterin. Steers were allotted to one of fourteen 4 acre pastures, which allowed a stocking density for all pastures of 1.5 animals/acre (initially, 0.82 animal units/acre). Control and implanted steers were commingled within each pasture. Pastures consisted of three forage types; smooth brome grass, smooth brome grass and birdsfoot trefoil, and smooth brome grass and alfalfa. All pastures were subdivided and grazed as four-paddocks. Cattle were generally rotated on a 10 to 11 day schedule depending on forage availability. Animals had continuous access to water and free-choice minerals. Steer weights were taken every 28 days during the grazing season to monitor performance. Cattle were dewormed a second time on day-56 of the trial. Final body weight on pasture was determined by averaging two full-weights taken on two consecutive days and average daily gain was calculated. The grazing season lasted for 90 days when the steers averaged 811 lb in body weight.

Immediately following removal from pasture, steers were transported to the MSU Beef Cattle Teaching and Research Center, E. Lansing, MI. The steers were managed as one group and stepped up to a finishing diet over 12 days. All steers were fed a common corn-silage based diet, in which, percentage of concentrate was increased step-wise until steers were adapted to a finishing diet (80% corn, 15% corn silage, and 5% supplement). Steers were then assigned to 12 pens with seven animals each. Steers were divided by pasture implant treatment and each group (control and Revalor-G) allotted by weight to one of two feedlot implant treatments, 80 mg trenbolone acetate and 16 mg estradiol (**Revalor-IS**; Intervet Inc.), or 120 mg of trenbolone acetate and 24 mg estradiol (**Revalor-S**; Intervet Inc.). Steers were penned by implant treatment so that the effect of implant treatment on feed efficiency could be determined. Daily feed delivery was recorded for each pen. Initial and final feedlot weights were the average of full weights taken on two consecutive days. All steers were harvested after 139 days of finishing at a commercial processing plant. Carcass measurements were recorded 48 hours post-mortem and included hot carcass weight, ribeye area, fat thickness, kidney, pelvic and heart fat percentage, and marbling score.

Results

Steers that grazed the smooth brome grass/alfalfa pastures had significantly greater ($P < .01$) average daily gain compared to those grazing smooth brome grass/birdsfoot trefoil or smooth brome grass, (2.88 vs. 2.68 and 2.63 lb/d, respectively). However, there was no significant interaction between pasture forage type and pasture implant, therefore the main effects of pasture implant are shown in Table 1. By design, the initial weight of control and implanted steers was similar ($P = 0.88$). Steers implanted with Revalor-G at the beginning of the 90 day grazing season had 10% greater average daily gain compared to those not implanted ($P = 0.01$). This resulted in a 22 lb advantage in weight for implanted steers at the end of grazing compared to controls. Although implanting with Revalor-G prior to the pasture phase did not significantly affect subsequent feedlot gain or carcass traits, the increased body weight caused by the Revalor-G implant tended ($P = 0.06$) to be maintained throughout the feedlot phase. Nevertheless, the difference in average hot carcass weight was not statistically different ($P = 0.41$). Cattle that received the pasture implant had greater ($P = 0.03$) dry matter intake during the finishing phase compared to those not previously implanted, however, there was no significant difference in feed

efficiency detected ($P = 0.55$).

There were no significant interactions between pasture implant and feedlot implant for performance or carcass data ($P > .13$). There were no significant effects of type of feedlot implant on daily gain, daily dry matter intake, or feed efficiency ($P > .16$; Table 2.). The percentage of cattle grading Mid-Choice was greater for steers implanted with Revalor-S compared to Revalor-IS ($P = .02$; Table 2.). All other carcass characteristics were similar between feedlot implant treatments ($P > .18$).

Conclusions

In the first year of this trial there were no apparent carry-over effects of pasture implant on the efficacy of the feedlot implant treatments. Implanting with Revalor-G significantly improved average daily gains while cattle were grazing pasture. The weight advantage for pasture implanted steers tended to be maintained to the end of the feedlot phase. Implanting with Revalor-IS or Revalor-S in the feedlot resulted in similar growth performance and carcass characteristics. It is not known whether the greater percentage of cattle grading Mid-Choice and higher for Revalor-S implanted steers is a repeatable affect. This trial is being repeated during 2005-06 to account for differing environmental conditions. CC

Table 1. Growth, feed efficiency, and carcass characteristics of steers not implanted during the pasture phase or implanted with Revalor-G at the start of grazing. (Least squares means)

Item	Treatment		SEM ^a	P-value
	Control	Revalor-G		
Performance grazing pasture				
Pasture initial weight, lb	560.3	559.5	3.5	0.88
Pasture final weight, lb	794.7	816.5	6.4	0.02
Pasture daily gain, lb	2.60	2.86	0.06	0.01
Performance in feedlot				
Feedlot initial weight, lb	813.5	835.2	5.6	0.01
Feedlot final weight, lb	1271.9	1303.8	11.7	0.06
Feedlot daily gain, lb	3.30	3.36	0.07	0.53
Daily dry matter intake, lb	22.5	23.4	0.24	0.03
Gain:feed (feed:gain)	0.146 (6.85)	0.144 (6.97)	0.003	0.55
Carcass characteristics				
Hot carcass weight, lb	754.0	762.9	7.6	0.41
Ribfat thickness, in	0.32	0.33	0.03	0.93
Ribeye area, in ²	12.9	13.0	0.2	0.78
Kidney, pelvic, & heart fat, %	2.0	2.0	0.1	0.57
Yield grade	2.42	2.41	0.12	0.98
Marbling score ^b	433.6	446.6	15.4	0.55
≥ Mid-Choice, %	25.9	26.6	6.9	0.94
Choice, %	55.9	69.4	8.0	0.24
Select, %	44.0	27.3	7.9	0.13
Standard, %	0.10	3.4	1.9	0.23

^aStandard error of the LS means.

^bSmall⁰⁰ = 400, Modest⁰⁰ = 500, Moderate⁰⁰ = 600.

Mention of trade names or commercial products in this report is solely to provide specific information and does not imply recommendation or endorsement by Michigan State University, nor does it imply approval to the exclusion of other products.

The National Cattlemen's Foundation (NCF) and the Chicago Mercantile Exchange (CME) Announces the 2006 Beef Industry Scholarship Program

Twenty scholarships of \$1500 will be awarded to youths pursuing careers in the beef industry. The program identifies and encourages talented and thoughtful students who have demonstrated a commitment to a career in the beef industry, either through classes, internships or life experience. Graduating high school seniors or full-time undergraduate students enrolled at a two-year or four-year college for the 2006/07 school year are encouraged to apply.

Applicants must submit a letter of intent, a 750-word essay that identifies a key issue confronting the beef industry and suggests a solution and two letters of recommendation. A full description of the scholarship program and submission requirements can be found at the National Cattlemen's Foundation website: www.nationalcattlemensfoundation.org or by calling 303-850-3347.

In addition to the scholarship, the first place winner will receive an airfare and lodging to attend the 2006 Annual Cattle Industry Convention and Trade Show in Denver, CO, February 1-4, 2006.

The Beef Industry Scholarship program is a cooperative effort of the CME and NCF launched in 1989 to celebrate the 25th anniversary of the Live Cattle Futures Contract on the Chicago Mercantile Exchange. The Chicago Mercantile Exchange has been a leader in the live cattle market since 1964, and the Beef Industry Scholarship Program exemplifies CME's commitment to the beef industry.

2005 CATTLE INDUSTRY SUMMER ROUND -UP



Cattle producers from across the state will gather in Escanaba on June 24-25 for the MI Cattlemen's Association's (MCA) 2005 Summer Round-Up. The weekend holds many activities for everyone in the family. An educational program with outstanding guest speakers, the presentation of MCA Annual Awards and visits to area farms will be featured during the two-day event.

The Summer Round-Up educational program will take place in the Joseph Heirman University Center at Bay Community College. This year, we will be focusing on electronic identification. Travis Choat, Smithfield Beef Group will tell us how the packing industry is using electronic identification and Mark Wellman from CattleLog will explain how to use the electronic identification information to manage production records. In addition, Ann Jousma-Miller from the Michigan Ag Commission will give an update on the TB testing requirements in surrounding states. MI Cattlemen Association directors Monte Bordner and Phil Jelinek have recently returned from an Australian agriculture tour and will present their thoughts and observations about the "land down under."

During the MCA Annual Awards presentation, "Member of the Year," "Young Cattleman of the Year," "Purebred Breeder of the Year," "Cattle Businessman of the Year" and "Agri-Business of the Year" recipients will be recognized. This year's after dinner speaker is John Queen III, a beef producer and vice president of the National Cattlemen's Beef Association. He is president and owner of the family's third generation cattle farm, which is located in the western mountain region of North Carolina.

Saturday will be devoted to touring farms and other interesting sites in the area. This event will prove to be an excellent way for producers from around Michigan and the region to network and share ideas, problems, and solutions with each other. Pre-registration for Summer Round-Up is requested.

For extra convenience, a Dean Trailways tour bus has been arranged for those that would like to travel to the Upper Peninsula on Thursday, June 23rd and return on Saturday, June 25th, following lunch. The bus will depart from Okemos at 1:00 P.M. and will make stops in Clare and Gaylord. Pre-registration by June 6th is required for this service. The cost is \$65 per person.

For a registration form and hotel information, go to www.micattlemen.org or contact the MCA office at (517) 347-8117.

Johne's Disease – Not my problem! Don't be fooled.

Joe Woltanski, DVM
USDA APHIS, VS, MI

Johne's Disease? I've heard of it, so what? It's not a big deal. Besides, I don't have it!!

There are probably only two groups of cattle owners who *really* need to be concerned about Johne's:

1) Those who have it! 2) Those who don't! All cattle producers need to ask themselves these questions!!!

Why should I care if I have Johne's?

- \$\$ Cost - Johne's, like any other chronic infection will nickel, dime, and dollar you to death. Losses come from decreased growth/production, increased culls at earlier ages and lighter weights, decreased sales, and possibly increased restrictions, especially in interstate and international movement.
- Reduced Marketing - Both live animals and beef will always be more marketable if they are "disease free."
- Potential human health link – not proven yet, but perception is reality.
- Hidden, growing problem – For every Johne's positive cow you see, there are more in your herd, and the problem will only grow without your intervention.

Why should I care if I don't have Johne's? Very simply, you don't want it. You need to be taking action now to prevent Johne's from getting into your herd. What actions can I take?

- Close your herd, completely. Probably not reality, but possible.
- Control visitors, especially any potential for manure contamination – boots, vehicle tires, feed, water, colostrum and milk sources.
- Purchase replacements only from low-risk herds – don't rely on just a single animal test, but work to know the status of the entire herd of origin.
- Pre- and post-test herd additions.

What can I do?

- Get educated – read, research, ask questions. An excellent source for information on Johne's disease can be found at <http://cvm.msu.edu/extension/johnes/>
- Work with your veterinarian. Ask if they have been "Johne's Certified" trained by the MDA.
- Currently the State of Michigan has money available to assist you and your veterinarian to develop Herd Plans and test for Johne's disease on your operation. Now is a good time to start.

For more information on participating in the Michigan Johne's Program, contact Jennifer Pickworth at the Michigan Department of Agriculture 517-241-1557, pickworthj@michigan.gov, or Dr. Joseph Woltanski, 616-490-4022, joseph.a.woltanski@aphis.usda.gov.

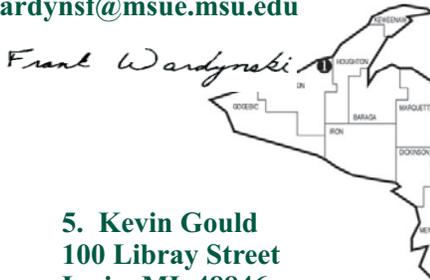
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AN AFFIRMATIVE ACTION/EQUAL OPPORTUNITY INSTITUTION

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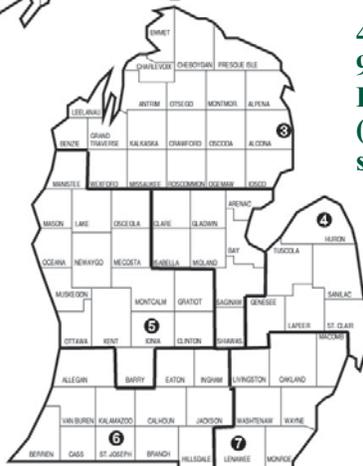
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