

Virginia Cooperative Extension

A partnership of Virginia Tech and Virginia State University



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Livestock Update

Beef - Horse - Poultry - Sheep - Swine

November 2010

This LIVESTOCK UPDATE contains timely subject matter on beef cattle, horses, poultry, sheep, swine, and related junior work. Use this material as you see fit for local newspapers, radio programs, newsletters, and for the formulation of recommendations.

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Dates to Remember

BEEF

DECEMBER

11 Culpeper Sr. VA BCIA Bull Sale. **Contact:** Scott Greiner, (540) 231-9163,
email: sgreiner@vt.edu

FEBRUARY

10-11 VA Beef Industry Convention. Hotel Roanoke. **Contact:** Bill McKinnon, (540) 992-1009, email:
bmckinnon@vacattlemen.org

MARCH

20 VA BCIA SW Bull Test Open House, Dublin. **Contact:** Scott Greiner, (540) 231-9163,
email: sgreiner@vt.edu

26 VA BCIA SW Bull Test & Bred Heifer Sale, Wytheville. **Contact:** Scott Greiner,
(540) 231-9163, email: sgreiner@vt.edu

SHEEP

DECEMBER

4 VA Sheep Producer's Association Fall Bred Ewe Sale. Rockingham County Fairgrounds.
Harrisonburg. 1:00 p.m. **Contact:** Corey Childs, (540) 955-4633

JANUARY

15 Shepherd's Symposium. Augusta County Government Center. Verona.
Contact: Scott Greiner, (540) 231-9163, email: sgreiner@vt.edu

November Beef Management Calendar

Dr. Scott P. Greiner
Extension Animal Scientist, VA Tech

Spring Calving Herds

- Secure winter feed supply!
- Body condition score cows, separate thin cows and provide nutritional management to improve BCS prior to calving
- Market calves to your best advantage
- Background calves for sale in December, if possible
- Feed replacement heifers to gain 1.5 - 1.75 lbs per day
- Cull open, old and very thin cows; check feet and legs, udders and eyes
- Consider alternative marketing strategies for cull cows to take advantage of seasonality in cull cow price
- Test hay for nutrient quality
- Get list of bull sales coming up early winter and spring

Fall Calving Herds

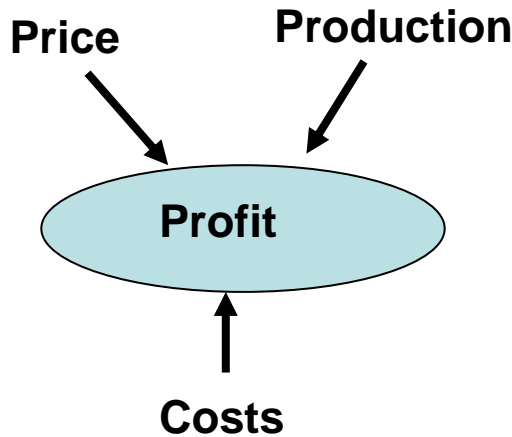
- Secure winter feed supply!
- Finish calving
- Check cows 2 to 4 times per day, heifers more often - assist early if needed
- Keep calving area clean and move healthy pairs out to large pastures 3 days after calving
- Ear tag and dehorn all calves at birth; castrate male calves in commercial herds
- Keep good calving records so that calves may be marketed as age/source verified
- Give selenium and vitamin A & D injections to newborn calves
- Feed cows extra energy after calving; stockpiled fescue will take care of needs. Cows calving at BCS < 5 should receive special nutritional attention.
- Test hay for nutrient quality
- Look for opportunities to secure low-cost feed supplies of bulk feeds or commodity feeds
- Keep high quality, high magnesium, high selenium minerals available
- Begin breeding replacement heifers late this month; try AI on heifers
- Get breeding soundness exams done on all bulls
- Purchase new herdsires at upcoming bull sales

Remember What Drives Profitability in the Cow-Calf Business

Dr. Mark A. McCann

Extension Animal Scientist, VA Tech

The recent corn price escalation has many cow-calf producers lamenting the cost of corn and its impact on the cost of by-products. Additionally, the cost of grain has an impact on fat cattle prices which has downstream implications on the calf prices we realize in Virginia. It is great to understand the connections among commodities and their impact on prices we receive. However, cow-calf producers do not need to lose sight of the management practices under their control which directly impact the profitability of their enterprise.



The figure shows that prices received for cattle, production levels (weaning weight and pregnancy rate) and operating costs work together to determine profitability. Over 60% of the cash costs related to cow-calf budgets are related to feeding the cow herd with pasture grazing or stored feeds. Feed supplement and mineral costs also add to the yearly feed/ nutrition portion of the budget. Analysis of low-cost producers has repeatedly revealed that maximizing grazing days and minimizing use of stored forage is an important step to lowering costs and improving profitability.

Stockpiling tall fescue coupled with strip grazing is our best way of reducing stored forage needs. Accumulating forage has been particularly difficult in view of this year's drought. Recent rains coupled with mild temperatures have helped with some fall forage growth. Strip grazing of stockpiled forage will maximize utilization and minimize waste.

Another component of nutritional expenses is purchased feed to supplement pasture or hay. In most cases green growing forage does not require supplementation. Supplementation of hay or silage is typically reserved for lactating cows or developing heifers. Basing a supplement plan on forage quality via a forage analysis allows more precision and perhaps the knowledge that forage alone could meet a cow's nutrient requirement. While trying to economize on purchasing feed it is important not to underfeed due to nutrition's impact on reproduction.

Attention should be given to practices in each category that impacts profitability. Price can be affected by marketing plans and methods, production levels are impacted by management and costs are impacted by purchasing decisions. Having production and financial records allow further examination of your operation's strengths and weaknesses. Several studies indicate that an important variable separating high and low profit operations is management of input costs. Your local Extension office has several of the tools available to assist in recording financial and production records as well as budget analysis.

VT Beef - Winter Webinar Series to Kick-Off December 7

Dr. Mark A. McCann
Extension Animal Scientist, VA Tech

Bill McKinnon, Executive Secretary of the Virginia Cattlemen's Association will be the featured speaker for the first Beef Webinar sponsored by Virginia Cooperative Extension and scheduled for 6:30 p.m., Tuesday, December 7th. McKinnon will discuss "Issues and Forces Impacting the Virginia Beef Industry," with focus on cattle markets and factors driving economics in the cow-calf sector. Participants in the on-line meeting will have the opportunity to ask questions through an on-line chat box or over the telephone using a number provided during the program.

Check with your local Extension Agent about accessing the program at your local office. Producers with high speed internet service can access the meeting at home. Webinar information and meeting links will be available on the VT Beef Extension webpage <http://www.vtbeef.apsc.vt.edu/>. From the VT Beef Extension site, you can click on the meeting link and go directly to the meeting.

In addition to the December 7th meeting, future webinars will be scheduled for January, February and March. If you have questions please contact Mark McCann at 540-231-9153 or mark.mccann@vt.edu.

BCIA Culpeper Senior Bulls Sell December 11

Dr. Scott P. Greiner
Extension Animal Scientist, VA Tech

The 53rd annual sale of the Virginia BCIA Culpeper Senior bulls will be held Saturday, December 11, 2010 at 12:00 noon at the Culpeper Agricultural Enterprises located on Route 29 just south of Culpeper, Virginia.

The sale will include approximately 60 fall-born yearling bulls representing the top end of the 84 bulls developed. Currently, Angus, Gelbvieh, Gelbvieh Balancers, and SimmAngus bulls are on test. Only bulls which meet stringent BCIA criteria will sell. BCIA has made some significant changes to the program which has been brought about through feedback from commercial bull buyers. Highlights include complete breeding soundness exams (including semen evaluation), volume buyer discounts, and an enhanced soundness and fertility guarantee on all bulls selling.

The majority of the bulls selling are sired by trait-leading, highly proven AI bulls of each breed. All bulls selling meet minimum genetic requirements (EPDs) to sire calves for the VQA Purple Tag Feeder Calf Program. Bulls have been screened for reproductive and structural soundness, and offered as guaranteed breeders. Complete performance information will be available on all bulls, including growth, maternal, and carcass EPDs, detailed test performance information, and ultrasound data.

Beef producers and others who are interested are invited to visit Glenmary Farm to view the bulls. Glenmary Farm is located at Rapidan, VA and operated by Tom and Kim Nixon.

For catalogs and detailed information on the bulls visit the website <http://bcia.apsc.vt.edu>, or phone VA BCIA at 540-231-9163 or Glenmary Farm at 540-672-7396. New for 2010 will be video on the bulls, which will be accessible through the BCIA website.

Sheep Management Tips - Late Fall

Dr. Scott P. Greiner

Extension Animal Scientist, VA Tech

Breeding to 6 Weeks Before Lambing

1. Mature ewes in average to good body condition should be fed to maintain or slightly increase their bodyweight during the first 3 ½ months of gestation. This is the time to take advantage of lower quality pasture. If this period occurs during the winter, hay will normally supply the necessary nutrients, with no supplemental grain required.
2. Thin ewes should be fed separately and supplemented with 1 to 1.5 lbs of grain per day to gain 10 to 15 lbs by 6 weeks before lambing.
3. Pregnant ewe lambs should be fed separately from mature ewes. They should gain approximately 25 lbs from breeding to 6 weeks before lambing. Attempts to cause large weight gains in ewe lambs during late gestation may lead to lambing problems. Conversely, underweight ewe lambs and/or poor body condition have low birth weight lambs and poor survivability and lower milk production.
4. If pregnant ewes are to be brought into the flock, keep these ewes separate from the main flock through lambing when feasible. This will diminish the risk of introducing abortion and other diseases into the main flock. Consult with your veterinarian regarding health management protocols for these newly received ewes.
5. Shear ewes if facilities are available to shelter ewes appropriately during winter months.

6 Weeks Before Lambing

1. Start feeding 0.5 lb of grain per head daily as a preventative for pregnancy disease. Grain may be in the form of whole shelled corn or barley. Even if ewes are on good quality pasture, they still require the extra grain. During the winter or when on poor quality pasture, feed approximately 4 lbs of hay in addition to grain.
2. Supplementation of tetracycline pre-lambing has been shown to reduce the incidence of abortions. Consult with your veterinarian on a flock health management protocol.
3. Make sure there is plenty of feed trough space so that ewes do not crowd each other at feeding time.

4 Weeks Before Lambing

1. Shear the wool from around the head, udder and dock of pregnant ewes. If covered facilities are available, shear the ewes completely. Sheared ewes are more apt to lamb inside, facilities stay drier because less moisture is carried in by the ewes, sheared ewes require less space, and environment is cleaner for newborn lambs and the shepherd. Sheared ewes must have access to a barn during cold, freezing rains, and they must receive additional feed during periods of extremely cold temperatures.
2. Vaccinate ewes for overeating disease and tetanus. These vaccines provide passive immunity to baby lambs through the ewes' colostrum until the lambs can be vaccinated at 4 to 6 weeks of age.
3. Check and separate all ewes that are developing udders or are showing signs of lambing. Check and remove heavy ewes once a week during the lambing season. Increase the grain on all ewes showing signs of lambing to 1 lb daily, and feed all the good quality grass/legume hay they will clean up.
4. Observe ewes closely. Ewes that are sluggish or hang back at feeding may be showing early signs of pregnancy disease. If so, these ewes should be drenched with 2 ounces of propylene glycol 3 to 4 times daily.
5. Shelter ewes from bad weather.
6. Get lambing pens and lambing equipment ready. There should be one lambing pen for every ten ewes expected to lamb.
7. Stock lambing supplies such as iodine, antibiotics, frozen colostrum, stomach tube, injectable selenium and Vitamin E, OB lube, lamb puller, ear tags, etc.

Shepherd's Symposium Scheduled for January 15

Dr. Scott P. Greiner
Extension Animal Scientist, VA Tech

The annual Virginia Shepherd's Symposium will be held Saturday, January 15, 2011 at the Augusta County Government Center in Verona, VA. The one-day program will include educational sessions with a variety of production, management, and marketing topics. A lamb lunch will be included. The evening prior, open meetings of the Virginia Sheep Producers Association and the Virginia Sheep Industry Council will be held. Program details and registration materials will be available in mid-November. For more information, contact Scott Greiner at 540-231-9163.

2010 State Fair of Virginia Lamb Carcass Evaluation Summary

Dr. Scott P. Greiner
Extension Animal Scientist, VA Tech

Since 1999, more than 2100 lambs have been evaluated through the Lamb Carcass Contest held in conjunction with the youth market lamb show at the State Fair of Virginia. The program serves as an educational tool for exhibitors and breeders regarding factors that influence the production of lambs that fits industry and consumer targets.

Five premium categories (Gold, Purple, Blue, Red, and Pink) have been established to rank lambs based on their combination of carcass merit and growth performance. The following standards were utilized, with carcasses failing to meet one or more of these qualifications placed in the Pink group:

- Minimum fat thickness of 0.10 in.
- Maximum fat thickness of 0.35 in. (maximum Yield Grade of 3.9)
- Minimum LMA for carcass weight using formula: $1.4 + (0.02 \times \text{HCW})$
- Minimum Quality Grade of Choice-
- Minimum carcass weight of 45.0 pounds

Carcasses meeting all of the above standards were ranked using carcass merit (determined by percentage boneless, closely trimmed retail cuts- %BCTRC) and live average daily gain (ADG). The formula to estimate %BCTRC utilizes carcass weight, fat thickness, body wall thickness, and loin muscle area and represents the predicted proportion of the carcass that is saleable retail product. Average daily gain is calculated for each lamb from the time of nomination in late June to the State Fair in early October (approximately 100 days). The average ADG of all lambs exhibited in the live show serves as the benchmark ADG value within year. Carcass premium categories were established as follows:

<i>Premium Category</i>	<i>Description</i>	<i>Carcass and ADG Parameters</i>
Gold	Lambs with both outstanding carcass merit and growth	≥ 50.0 %BCTRC & ≥ 0.45 ADG
Purple	Lambs with superior carcass merit and desirable growth	≥ 50.0 %BCTRC with ADG < Gold standard or 49.0-49.9 %BCTRC with ≥ 0.41 ADG
Blue	Lambs with desirable carcass merit	Carcasses not meeting Gold or Purple criteria with > 47.5 %BCTRC
Red	Lambs meeting carcass standards but have less desirable combination of leanness and LMA	All carcasses with %BCTRC < 47.5
Pink	Lambs which are over-finished or under-finished, and/or have small LMA relative to their weight	Carcasses failing to meet one or more of the standards listed above

The following table summarizes the carcass information since beginning the program. Over the last 12 years, live weights and carcass weights of lambs have gotten heavier. Associated with this weight increase has been a corresponding increase in ADG, loin muscle area, and fatness. While a portion of the increase in LMA is directly related to weight, the lambs have also improved in overall muscling, as indicated by a higher percentage of the lambs meeting the minimum LMA standard for their carcass weight compared to the first few years of the contest.

The last two years (2009 and 2010), lambs have gotten heavier and fatter. Compared to the five-year average, in both 2009 and 2010 there were more lambs which were overfed as indicated by the increased percentage of Yield Grade 4 lambs as well as more lambs failing to meet the minimum LMA standard. Both years had more very heavy carcasses (85 pounds and greater) as well. As a result of these factors, less lambs qualified for the Gold, Purple and Blue premium categories.

STATE FAIR OF VIRGINIA LAMB CARCASS CONTEST SUMMARY 1999-2010

	2010	5 year avg. (2005-2009)	2009	2008	2007	2006	2005	12 year avg. (1999-2010)
<u>Carcass Measurements:</u>								
No. Carcasses	135	<i>799 total</i>	138	128	157	185	193	<i>2153 total</i>
Live Wt., lb.	129.0	<i>125.9</i>	128.7	126.6	127.2	124.2	124.1	<i>122.1</i>
ADG, lb./day	0.41	<i>0.38</i>	0.42	0.38	0.37	0.36	0.37	<i>0.36</i>
Carcass Wt., lb.	72.5	<i>71.3</i>	72.7	69.7	73.0	70.9	70.5	<i>68.3</i>
Dressing %	56.1	<i>56.6</i>	56.4	54.9	57.4	57.0	56.7	<i>55.8</i>
Adj. Fat Thickness, in.	0.28	<i>0.23</i>	0.24	0.22	0.23	0.22	0.23	<i>0.21</i>
Yield Grade	3.2	<i>2.68</i>	2.8	2.6	2.7	2.6	2.7	<i>2.54</i>
Loin muscle area, sq. in.	3.16	<i>3.24</i>	3.24	3.25	3.26	3.22	3.23	<i>3.10</i>
Leg Score (12 = Ch , 13 = Ch+)	12.3	<i>12.5</i>	12.4	12.3	12.5	12.6	12.5	<i>12.5</i>
% BCTRC	47.1	<i>48.1</i>	47.8	48.4	47.7	48.2	48.3	<i>48.2</i>
Quality Grade (11 = Ch-, 12 = Ch)	11.7	<i>11.4</i>	11.6	11.4	11.4	11.4	11.3	<i>11.4</i>
Carcass Price, \$/cwt.	\$270.00	<i>\$187.15</i>	\$200.00	\$200.00	\$200.00	\$160.00	\$185.00	<i>\$160.83</i>
Live Value, \$/cwt.	\$151.44	<i>\$105.80</i>	\$112.80	\$109.71	\$114.71	\$91.23	\$104.91	<i>\$89.93</i>
<u>Carcass Contest Specifications:</u>								
ADG standard for premium placings	0.41	<i>0.36</i>	0.41	0.37	0.35	0.34	0.34	<i>0.35</i>
< 0.10 in. Fat Thickness	1 (0.7%)	<i>0.0%</i>	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	<i>1.7%</i>
Yield Grade ≥ 4 (> 0.35 in. fat)	28 (20.7%)	<i>6.3%</i>	16 (11.6%)	7 (5.5%)	12 (7.6%)	9 (4.9%)	6 (3.1%)	<i>5.6%</i>
< minimum Loin Muscle Area	17 (12.6%)	<i>7.5%</i>	18 (13.0%)	7 (5.5%)	9 (5.7%)	10 (5.4%)	16 (8.4%)	<i>13.7%</i>
< Ch- Quality Grade (No Roll)	1 (0.7%)	<i>0.0%</i>	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	<i>0.1%</i>
Carcass weight < 45.0 lb.	0 (0.0%)	<i>0.3%</i>	0 (0.0%)	2 (1.6%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	<i>0.2%</i>
Gold Premium Category	1 (0.7%)	<i>1.5%</i>	3 (2.2%)	5 (3.9%)	0 (0.0%)	2 (1.1%)	2 (1.0%)	<i>1.8%</i>
Purple Premium Category	18 (13.3%)	<i>17.6%</i>	14 (10.1%)	26 (20.3%)	16 (10.2%)	39 (21.1%)	46 (24.1%)	<i>17.6%</i>
Blue Premium Category	33 (24.4%)	<i>31.7%</i>	42 (30.4%)	40 (31.3%)	51 (32.5%)	61 (33.0%)	59 (30.9%)	<i>31.0%</i>
Red Premium Category	39 (28.9%)	<i>35.8%</i>	46 (33.3%)	41 (32.0%)	71 (45.2%)	64 (34.6%)	64 (33.5%)	<i>29.8%</i>
Pink Premium Category	44 (32.6%)	<i>13.4%</i>	33 (23.9%)	16 (12.5%)	19 (12.1%)	19 (10.3%)	20 (10.5%)	<i>19.9%</i>
<u>Carcass Distributions:</u>								
Yield Grade 1	12 (8.9%)	<i>20.7%</i>	29 (21.0%)	30 (23.4%)	31 (19.7%)	40 (21.6%)	35 (18.3%)	<i>26.8%</i>
Yield Grade 2	41 (30.4%)	<i>47.2%</i>	57 (41.3%)	56 (43.8%)	84 (53.5%)	85 (45.9%)	95 (49.7%)	<i>46.3%</i>
Yield Grade 3	54 (40.0%)	<i>25.9%</i>	36 (26.1%)	35 (27.3%)	30 (19.1%)	51 (27.6%)	55 (28.8%)	<i>21.4%</i>
Yield Grade ≥ 4	28 (20.7%)	<i>6.3%</i>	16 (11.6%)	7 (5.5%)	12 (7.6%)	9 (4.9%)	6 (3.1%)	<i>5.6%</i>
Prime Quality Grade	1 (0.7%)	<i>0.5%</i>	0 (0.0%)	1 (0.8%)	2 (1.3%)	1 (0.5%)	0 (0.5%)	<i>1.2%</i>
Choice Quality Grade	133 (98.6%)	<i>99.5%</i>	138 (100%)	127 (99.2%)	155 (98.7%)	184 (99.5%)	191 (100%)	<i>98.7%</i>
No Roll Quality Grade	1 (0.7%)	<i>0.0%</i>	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	<i>0.1%</i>
HCW < 45 lb.	0 (0.0%)	<i>0.3%</i>	0 (0.0%)	2 (1.6%)	0 (0.0%)	0 (0.0%)	0 (0.0%)	<i>0.2%</i>
HCW 45-54 lb.	8 (5.9%)	<i>6.6%</i>	7 (5.1%)	17 (13.3%)	6 (3.8%)	10 (5.4%)	13 (6.8%)	<i>10.7%</i>
HCW 55-64 lb.	27 (20.0%)	<i>19.0%</i>	29 (21.0%)	21 (16.4%)	24 (15.3%)	36 (19.5%)	42 (22.0%)	<i>26.4%</i>
HCW 65-74 lb.	42 (31.1%)	<i>33.8%</i>	36 (26.1%)	45 (35.2%)	53 (33.8%)	67 (36.2%)	69 (36.1%)	<i>34.4%</i>
HCW 75-84 lb.	35 (25.9%)	<i>31.3%</i>	48 (34.8%)	34 (26.6%)	59 (37.8%)	57 (30.8%)	52 (27.2%)	<i>22.7%</i>
HCW > 85 lb.	23 (17.0%)	<i>9.0%</i>	18 (13.0%)	9 (7.0%)	15 (9.6%)	15 (8.1%)	15 (7.9%)	<i>5.6%</i>