Things to Do Before Purchasing a Bull

BRETT BARHAM

I know many producers spend many hours in the process of purchasing a bull. It’s a big decision – one that can impact your herd for many years beyond the expected usefulness of the bull due to his daughters remaining in production. It pays to do some homework on determining what kind of bull you need prior to purchase. Here are some steps to help guide you through the process.

1. Identify Herd Goals. Herd goals serve as the foundation for sire selection and provide guidance as to traits with the most economic importance. Defining the production and marketing system, along with management strategies and environment, are key factors that warrant consideration.
   • Will the bull be used on heifers, mature cows or both?
   • Will replacement females be retained in the herd?
   • How will the calf crop be marketed (at weaning? retained ownership? sell females?)?
   • What are the labor and management resources available?
   • What are the feed resources and environmental conditions of the operation?
   • How will this sire contribute to the overall breeding system plan?

2. Assess Herd Strengths and Weaknesses. Fundamental records are key to identifying strengths and weaknesses. Basic performance parameters such as calving percentage and dates, weaning percentage, weaning weights, sale weights, carcass data, feed usage, etc., are necessary to serve as the basis for assessing areas of strength and those needing attention. This type of information is extremely important considering the high input costs and low operating margins of today’s markets.

3. Establish Selection Priorities. Concentrate on those factors which stand to have the largest impact on profitability. Remember that income is derived from performance (sale weight, percent calf crop weaned, carcass merit, etc.). Performance is a function of both genetics and environment/management. Superior genetics can be negated by poor management, which emphasizes the importance of separating the impact of management (nutrition, health program) from that of genetics when specific priorities for the herd are established.

Considering both the genetic and management influences on various traits is important. Focus on a
handful of priority traits rather than attempting to change many traits simultaneously. Establishing the few traits to focus on is the key factor.

4. **Utilize Selection Tools.** Once selection priorities have been established through close examination of herd goals and current status, a number of useful tools are at the disposal of beef producers to assist in making genetic improvement. Genetic differences across breeds have been well established, and utilization of different breeds in a complementary fashion through structured crossbreeding plans provides the opportunity for improvement in multiple traits.

Most importantly, heterosis attained through crossbreeding has been shown to have significant favorable impact on traits such as reproductive efficiency and cow longevity which are critical for herd profitability. The limited ability to select for reproductive traits in the form of EPDs further emphasizes the importance of capturing the value of heterosis.

EPDs are available for many traits of economic importance. The introduction of economic indexes, which combine several related traits and their economic values into one EPD, are available to assist with simultaneous improvement in multiple traits which impact areas such as carcass merit and postweaning profit. Again, with the large number of EPD tools available, the critical step is to determine the EPDs which are most important and establish benchmarks relative to each.

5. **Establish Benchmarks.** Several tools can be used to help determine EPD specifications. EPD values for current and past sires can be used as benchmarks. With these benchmarks, EPD specifications can be set to reflect the desired increase or moderation in performance for a particular trait. As an example, establishing a benchmark for milk EPD can be determined through the relationship between previous sires’ genetics for milk and the performance of his daughters in the herd.

6. **Find Source.** With the above defined, we can now begin to look at individual bulls. There are many sources of bulls that warrant consideration – production sales, test stations and private treaty sales. Of critical importance is that the bull be from a reputable source which will stand behind its product. It may be necessary to look at several sources in order to find the correct bull.

7. **Do Your Homework.** The first step to doing so is to evaluate the sale catalog, performance pedigree and data. By examination of the bull’s performance record, determine which bulls meet the EPD and other specifications that have been established (and, likewise, eliminate those that do not meet the specifications). Be prepared to make tradeoffs, as the perfect record may not be attainable. Do not be surprised or alarmed when the bulls you have highlighted appear scattered throughout the sale order. Remember to stick to the selection criteria and qualifications/specifications that have been established. All this can and should be accomplished prior to departing for any sale.

8. **Have a Look.** Once the list has been narrowed to only bulls which meet the criteria, these bulls can be further evaluated and the selection refined. Having a list of suitable bulls prior to arrival at the auction or farm will not only save time but also assist in making sure the right bull for the situation is purchased. Upon narrowing the potential candidates on paper, the bulls can be evaluated for suitability of phenotypic traits and the potential candidate list shortened even further. Not all relevant traits have EPDs (examples include disposition, foot soundness, fleshing ability, etc.) and, therefore, must be evaluated visually.

9. **Make a Sound Investment.** For many cow/calf producers, purchasing a new bull is a relatively infrequent occurrence. This emphasizes the importance of selecting the right bull, particularly in single-sire herds. The value of the right bull cannot be overestimated. Investments in good genetics will pay dividends, both short- and long-term, through the influence the bull has on each calf crop as well as his daughters that are retained in the herd.

10. **Manage the New Bull Properly.** Of equal importance is the care and management of the newly acquired bull. Proper management and nutrition are essential for the bull to perform satisfactorily during the breeding season. With most new herd sires purchased as yearling bulls, management prior to, during and after the first breeding season is particularly important. Plan ahead by acquiring a new yearling bull at least 60 to 90 days prior to the breeding season so ample time is available to allow for adjustment to a new environment, commingling with other bulls and getting the bull in proper breeding body condition.

    Remember, your local Extension agent is a great resource when it comes to help with making improvements in your operation – give them a call!

Source: Scott P. Greiner, Ph.D., Virginia Tech University
Deworming Your Calves Pays

DR. JEREMY POWELL

Internal parasites are an ever present factor in livestock operations, although it’s easy to forget their negative effects because they are often “out of sight and out of mind.” According to the USDA’s National Animal Health Monitoring System (NAHMS) data, nearly 40% of all cow-calf operations do not treat their unweaned calves with a dewormer product. This low utilization of parasite control assuredly impacts the overall production of our cattle and decreases their ability to perform.

Performance loss from parasite infections is subtle. We don’t typically see overt clinical signs from cattle carrying parasite infections. However, they do continuously rob our animals of optimum performance every day. Worms cause cattle to decrease their feed intake. This lowers weight gain and reduces body condition, potentially leading to lowered reproductive performance, and decreases milk production, causing reduced weaning weights. Internal parasite infections also cause intestinal tissue damage and blood loss, leading to poor nutrient absorption, lowered feed conversion and reduced immune competence. All of these negative effects lead to increased costs to the producer and cause poor productivity.

Knowing that parasites cause substantial economic loss to your operation each year, the next question is, “How much will my calves benefit from controlling worms?” Recent research completed at the University of Arkansas demonstrates the impact of deworming calves prior to weaning. This study was undertaken to compare the performance of calves that received dewormer prior to weaning versus calves that did not receive dewormer.

Eighty-seven fall-born beef calves from the University of Arkansas beef cow herd were utilized in this study.

Calves had average body weights of 310 pounds and were randomly allocated to treatment groups. The two treatment groups were examined over an 85-day pre-weaning phase and included: (A) calves injected with Cydectin® at 85 days prior to weaning and (B) a negative control group (Table 1).

Table 1. Treatments and performance were as follows:

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<th>Group</th>
<th>Description</th>
<th>ADG</th>
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<tr>
<td>(A)</td>
<td>Dewormed 85 days prior to weaning</td>
<td>1.82</td>
</tr>
<tr>
<td>(B)</td>
<td>Negative Control</td>
<td>1.70</td>
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Results showed that the calves that were treated during the pre-weaning phase had significantly better average daily gain (ADG) up until weaning when compared to the untreated calves during the same period (1.82 vs. 1.70 lb/day). Average cost of treatment for calves at 85 days prior to weaning was less than $0.90/head, and treated calves would have been worth approximately $13.00 more per head than untreated calves at weaning due to their body weight advantage.

These results indicate the importance of deworming your calves and the impact it can have on gain performance. Current recommendations suggest that producers treat all calves over 220 pounds to improve weaning weights. Always remember to use all products as specified on the label. If you reduce the dose or give the product in a nonindicated fashion, the effectiveness of the product will be diminished. However, utilizing proper deworming practices on your farm will increase your overall productivity and efficiency. For more information about improving the management of your herd, contact your county Extension office.

Utilizing proper deworming practices on your farm will increase your overall productivity and efficiency.

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