

The Newsletter From the Oklahoma Cooperative Extension Service

August 3, 2007

In this Issue

"**Preg**" Check and Cull Replacement Heifers Early Glenn Selk, OSU Extension Cattle Reproduction Specialist

Is Multi-Species Grazing a Peek at the Future? Dave Sparks, DVM, Area Extension Food-AnimalQuality and Health Specialist

"Preg" Check and Cull Replacement Heifers Early by Glenn Selk

Many Oklahoma ranchers choose to breed the replacement heifers about a month ahead of the mature cows in the herd. In addition, they like to use a shortened 45 to 60-day breeding season for the replacement heifers. The next logical step is to determine which of these heifers failed to conceive in their first breeding season. This is more important today than ever before.

As the bulls are being removed from the replacement heifers, this would be an ideal time to call and make arrangements with your local veterinarian to have those heifers evaluated for pregnancy in about 60 days. In two months, experienced palpaters should have no difficulty identifying which heifers are pregnant and which heifers are not pregnant (open). Those heifers that are determined to be "open" after this breeding season, should be strong candidates for culling. Culling these heifers immediately after pregnancy checking serves three very economically valuable purposes.

1) Identifying and culling open heifers early will **remove sub-fertile females from the herd.** Lifetime cow studies from Montana indicated that properly developed heifers that were exposed to fertile bulls, but DID NOT become pregnant were often sub-fertile compared to the heifers that did conceive. In fact, when the heifers that failed to breed in the first breeding season were followed throughout their lifetimes, they averaged a 55% yearly calf crop. Despite the fact that reproduction is not a highly heritable trait, it also makes sense to remove this genetic material from the herd so as to not proliferate females that are difficult to get bred.

2) Culling open heifers **early will reduce summer forage and winter costs**. If the rancher waits until next spring to find out which heifers do not calve, the pasture use and winter feed expense will still be lost and there will be no calf to help eventually help pay the bills. This is

money that can better be spent in properly feeding cows that are pregnant and will be producing a salable product the following fall.

3) Identifying the open heifers shortly after (60 days) the breeding season is over will **allow for marketing the heifers while still young** enough to go to a feedlot and be fed for the choice beef market. The grading change of several years ago has a great impact on the merchandising of culled replacement heifers. "B" maturity carcasses (those estimated to be 30 months of age or older) are very unlikely to be graded choice. As a result, the heifers that are close to two years of age will suffer a price discount. This price discount from yearling heifer to commercial cull cow is increasing. Note the graphic below (Figure 1) which shows the increase in the difference between heifers and cull cows from 1980 to the present.



Figure 1. Average Price Difference (\$/CWT) of Yearling Heifers Compared to Cull Commercial Cows from 1980 to 2007.

Currently <u>non-pregnant</u>, yearling 850 pound heifers (shortly after a breeding season) are selling for about \$102 per cwt. Therefore an 850 pound, culled replacement heifer is worth about \$867. Non-pregnant two-year old cows are selling for about \$65 per cwt. Open two-year old cows (those that could have been identified shortly after the breeding season) that weigh 1000 pounds would only sell for about \$650 next spring.

The average expense for owning the cow is about \$1 per day. So the total loss of keeping the open heifer would be about \$200 in feed and forage and another \$217 in lost value. **The grand total expense for not culling open replacement heifers in today's market is about \$417 per head.** Therefore, it is imperative to send heifers to the feedlot while they are young enough to be fed for 4 to 5 months and not be near the "B" maturity age group.

Certainly the percentage of open heifers will vary from ranch to ranch. Do not be concerned, if after a good heifer development program and adequate breeding season, that you find that 10% of the heifers still are not bred. These are the very heifers that you want to identify early and remove from the herd. It just makes good economic business sense to identify and cull non-pregnant replacement heifers as soon as possible.

Is Multi-Species Grazing a Peek at the Future?

by Dave Sparks, DVM

Oklahoma has been cattle country longer than anyone alive today can remember. Today, however, meat goats, while still a small player, have become the fastest growing livestock species in Oklahoma and nationally. For several years some of the more innovative ranchers have used goats to control or eliminate unwanted plant species in their pastures with little or no thought to the profitability or marketability of the goats. The idea was to save on mechanical or chemical weed and brush control. With the current high value and demand for goat meat ideas are shifting from "brush goats" to "meat goats", even when they are the same goats.

The old thought that a goat can eat anything including tin cans is not accurate, but it is true that they prefer to eat weeds and brush and will usually eat grass only when all the forbs and browse is gone. This suggests that with today's high input costs for land and forage, two income streams may be better than one. Goats and cattle can each utilize the grazing that is wasted by the other with very little direct competition. Perhaps we need to be managing pastures to preserve a balance of species instead of trying to "clean out" weeds and browse.

Another interesting aspect of multi-species grazing is that while the internal parasites of goats and cattle are closely related, they are different enough that each is a "dead end host" for the other's worms. Although this is widely accepted, no one has known to what degree this impacts production.

To try to learn more about these questions, a two year, on-farm study was undertaken by the Oklahoma Cooperative Extension Service this summer at Bartlesville, Oklahoma. Approximately 200 acres of mixed native range was divided into 3 portions and stocked with cattle only, goats only, and cattle and goats mixed. Stocking rates were determined by the area agronomist using an equivalent forage availability per pound of live animal weight and production estimates from the NRCS web soil survey. We will be looking at financial impact, parasite impacts, and the impact on the range. A Field Day has been scheduled for October 20, 2007, at the Bill Fesler ranch east of Bartlesville to share the findings from the first summer with all who are interested.

Is the popularity of goat meat and the high prices for goats here to stay? It is hard to accept, because most of us lifetime beef eaters would rather fight than switch. Consider, however, that goat is the most consumed meat in the world, and multi-cultural consumers, notably Middle Eastern, Hispanic, and Caribbean Island, are the fastest growing sectors of the U.S. population and have the fastest growing spendable incomes.

As production costs continue to rise, efficiency becomes more important. Can cattle producers afford to continue seeing weed and brush control as an expense when it can be a source of income? Make plans to attend the Field Day on October 20 and find out.

Oklahoma State University, in compliance with Title VI and VII of the Civil Rights Act of 1964, Executive Order 11246 as amended, Title IX of the Education Amendments of 1972, Americans with Disabilities Act of 1990, and other federal laws and regulations, does not discriminate on the basis of race, color, national origin, sex, age, religion, disability, or status as a veteran in any of its policies, practices or procedures. This includes but is not limited to admissions, employment, financial aid, and educational services.