



Kind Of Cattle To Breed--- Some Considerations

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Beef is the preferred meat. At the meat counter, beef has the highest price tag and sells in the greatest amount. American families prefer beef and by a wide margin. With this state of affairs, anyone who delivers an oral blast at the beef cattle we raise runs a risk. It is not my intent to "dish up" an oral blast. It is my intent, however, to discuss some considerations that are worthy of our time. Although beef is on a lofty perch, constructive beef breeders believe that there is danger in complacency and foot-dragging by those who may have the attitude, "We're getting along all right; let's not rock the boat."

Cattle are important. In 1962 there were 95.5 million cattle of all kinds within the U.S.A. Of this number, slightly more than 28 million were beef cows. In Missouri the number of beef cows increased by 6% last year so that we now have 1,240,000 head of beef cows. Missouri ranks sixth among all states. Beef cattle provide the primary source of cash income from farming in Missouri.

The importance of beef cattle brings out the obvious fact that any improvement--however small--will be very important because it will affect great numbers of cattle and the meat supply.

We raise beef cattle to produce beef; this basic philosophy must always be maintained when consideration is given to the kind of cattle to breed.

One guide to the kind of beef cattle to breed is found at the market place--on the bricks and in the meat packing plants. The steer carcasses most in demand now weigh from 600 to 700 pounds and they grade U.S. choice. This means that the steers weigh from 1,000 to 1,150 pounds on foot. At other seasons they may not want them quite so heavy. The heifer carcasses in greatest demand now weigh from 500 pounds to, in some cases, 700 pounds and grade U.S. choice. The heifers, on foot, weigh in at 825 to an extreme of 1,100 pounds. The source of this information is the U.S.D.A. Livestock Market News dated March 13, 1962. Thus, based on the U.S.D.A. Livestock Market News, the preferred weight of steers is 1,000 to 1,150 pounds. The preferred weight of heifers begins at 825 pounds, approximately.

Will these weights, in the years ahead, continue as the preferred weights? The answer to this question resides at the meat counter and with the cattlemen. Some have predicted that preferred slaughter cattle weights will gradually be lowered and lowered until the preferred weight is 800 to 900 pounds. I hope that this prediction is wrong. The reason is obvious: There is only one method for producing high-quality 800 pound finished animals. This animal must be full fed from the time he is born until he is sold. This system is inflexible--there is only one way to do it. At the same time, however, I would defend this system for certain sections of Missouri and the U.S.A. We realize that in this state and nation, great quantities of roughage and pasture are produced. Cattle, primarily, must consume it. Cows must consume it. Steers must consume some of it. Steer management systems that use large quantities of roughage will not prepare a steer to be marketed advantageously at 800 pounds or 900 pounds. Cattlemen need to have some flexibility to their cattle enterprise.

Will the grade of U.S. choice continue to be the preferred grade? It may be--it may not be. At present, low choice seems to be the preferred grade, indicating that there is a leaning toward less marbling.

The chief reason for one carcass grading above another is amount of marbling. The location of fat is the chief determinant. The right amount must be in the rib eye. An abundance of fat on other parts of the carcass is not a helpful feature--it is a superfluous feature. Let us use a theoretical calf to discuss marbling further. A calf is born; he is near perfect in every respect. We care for and feed him properly. Under this "set up" with increasing age and weight he will at some time pass through all grades on the U.S.D.A. list: first, the vealer, then the fat calf grade, through the standard grade, good grade, choice grade and finally the prime grade. He is the same calf; the reason for his changes from one grade to the next is a combination of weight and finish. No matter how much exterior fat he may acquire, he has made prime grade because of near perfect marbling with his good conformation.

Beef cattle fat or finish has become a conversation piece. It has shortened the tempers of some. And it has been debated by many. If we put this "fat" question in its proper perspective, it seems to be relegated to location of the fat. That is, is the fat on the beef or is the fat in the beef? Some say, "Why, they want us to breed cattle that have no fat at all." Others say, "All they want from us is to produce lean meat that is tender." One well known animal husbandryman made this statement about leanness: "May God help us if lean meat that is tender is the extent of the vision and foresight and imagination of the meats man." He thinks that if we pay attention to nothing but leanness and tenderness we will sell our beef producers down the river. Many will agree with this attitude. At the same time, however, this same group will also agree, probably, that we must produce cattle with a minimum of waste exterior fat but the lean portion--the portion we eat--must have quality. Meatiness is largely bred into the cattle and to a lesser extent, tenderness. Quality of beef is to some extent determined by the way a calf is handled and fed from birth to slaughter. Wastiness can be influenced significantly through feeding and management procedures.

Cattle within the same grade and weight have greatly different yields of saleable beef. The United States Department of Agriculture Agricultural Marketing Service has advocated for several years a yield grade to indicate cutability or yield of saleable portion of a carcass to the customer, this in addition to the quality grade. These yield grades would be indicated by numbers one through six. It has been pointed out by U.S.D.A. that two steers which weigh 1,000 pounds each and grade choice will have great difference in yield. In a cut-out test one of these yielded \$73.00 more beef than the other. In our hurry to produce this high-cutability steer, we must avoid the mistake made by swine men at the beginning. At the beginning hogs that had great length of body and very little fat had a brief period of popularity. These hogs had hardly enough muscle to hold joints and bones together. But they weren't fat. It was a no fat, no nothing hog. In the decision to emphasize cutability in our cattle we need to come back to the philosophy that we raise cattle to produce beef and remember beef is primarily muscle interspersed with the right amount of fat and covered with enough "bark" to give it the preferred taste.

We must consider what kind of cattle produce this product.

What do the cows and the bulls look like? Are they deep bodied, short legged? Do they have wide frames? What color are they? Do they have horns or don't they have horns? Or is it a fact that there "ain't" such an animal at the present time.

The "steer of tomorrow" is here today. That means that his parents are here today. Thus, our task is to identify the cattle and the strains of cattle that are the right kind. Once these are located, both commercial and purebred breeders will make them popular. We need to increase their numbers.

My belief is that these cattle will possess "doing-ability," size enough but not too much, and muscling. These, with other ever-important characteristics will exist. At this point let us discuss each separately; first, doing ability. Doing ability is associated with a high rate of gain. A high rate of gain is associated with efficient use of feed. But to produce the carcasses that are required, these cattle must also have early maturity. The definition used by Professor John Knox of New Mexico is a good one to remember. Mr. Knox says, "early maturity should mean ability to reach market weight and finish at an early age." "Small size," states Mr. Knox, "has often been confused with early maturity." He makes a point of the fact that small cattle fatten at lighter weights but not at younger ages. This is another way of saying that small cattle have small daily rates of gain. This definition of early maturity means that the cows and bulls must be able to pass to their offspring enough growthiness for fast efficient gains and the steers must finish at choice grade, preferably from 900 to 1,150 pounds.

At a recent American Hereford Cattle Congress held at Kansas State University, steers which had been on feed for 210 days were slaughtered. They were placed on foot and in the carcass by a group of competent judges. Three of the top four carcasses came from steers that had made the highest average daily gain. Obviously these cattle had the ability to gain bred into them and they had enough feed capacity so that they fattened as they grew. And they were finished at desirable market weights. Their conformation was highly satisfactory.

Another virtue that will characterize our best cattle is size enough--not too big, not too little. But how big is this. You may know that I worked for Professor Trowbridge several years. I remember his remark about the short piece of string. He asked, "how long is a short piece of string?" Six people would give six different answers, I suppose. We have a parallel in cattle, "How big is big enough?" Any cow is big enough if she produces calves that will meet the required market weight and finish that we have established.

All of us must remember that our brood cows are maintained 365 days a year. We must remember that the amount of feed consumed is not the same for 1,000 pound cows and 1,400 pound cows. Obviously the bigger cow must produce greater weights in the calf to pay for herd upkeep.

Muscling must be bred into our cattle.

At the outset time was spent indicating that lean meat interlaced with enough fat to improve the eating quality is needed. The majority of this portion will be lean meat. Lean meat is muscle. Muscling is a highly heritable characteristic in beef cattle. In the beef animal it is indicated by thickness, particularly of hind quarter, at the forearm and general body width. The cattle that are of the right kind, then, must exhibit thickness in these areas. Excessive depth at the expense of thickness will probably not be tolerated. In this discussion an effort has been made to spend time only in those areas where there is a fair amount of controversy. We know that cows must possess other commonly recognized traits to be profitable. We refer to such items as longevity, regularity of calving, mothering and milking ability, freedom from disease, a good disposition and others.

In summarizing, we must remember that beef cattle are of extreme importance in the agricultural economy, that they now produce the meat preferred by most. But at the same time, there is a need to constantly improve our cattle, particularly in meatiness and doing-ability. As this is done, however, quality in the beef must be maintained. The so called "steer of tomorrow" is here today. The strains of cattle which produce these cattle must be located and their number increased. Tools that are now available and others that will become available need to be used in this search. In a country so vast as ours, there is no one type of cattle that is best for all areas.