



Feed Storage Facilities Would Boost Livestock In Northeastern Brazil

By William J. Saba

To a native Arizonan, vegetation in the Fortaleza area looks quite lush and green, but as one travels 20 or so miles into the interior, conditions become drier. Annual rainfall in Ceará is around 25 inches with a range of 20 to 70 inches.

The state of Ceará generally has six to eight months of dry weather, followed by a four to six month rainy season. This problem, coupled with the fact that there are little or no storage facilities for feeds, presents a perplexing problem for the average fazendeiro, or rancher.

Beef Has Brahma Blood

Average "feeder steers" of the northeast are predominantly of Brahma ancestry, all bulls, and of varied conformation. Because of belief that an animal must have its full growth be-

fore it can be fed or slaughtered, average age of a typical "feeder steer" is five years.

Most of the feedlots are located in population centers, and approximately 90 percent of the meat is sold immediately after slaughter. Many of the beef animals are raised in the interior, and are driven or shipped in railroad cars, sometimes a trip of two or more days. Road conditions do not favor trucking of live beef.

Basic feed ingredients available are mandioca, cottonseed meal (20 percent protein), bran, corn, sorghum (not always available), and various grasses, elephant grass predominating. Both the tubers and stems of the mandioca plant are used, the tubers being quite high in starch. A typical ration consists of 25 percent cottonseed meal, 25 percent mandioca (stems or tubers or both), 15 percent bran or corn and 35 percent grass. Some sugar cane tops are also fed, if available.

Put On 90-Day Feed

Feeding is on a limited basis except for grass, and many times straight cottonseed meal is fed. The animals are fed 90 days prior to slaughter. Quoted daily gains run between half a pound and four pounds.

Due to human competition for calories, it is quite expensive to feed cattle in Ceará on concentrates, and many of the feeders say they are losing money. With some improvisations

THREE VIEWS OF livestock in Ceará. At left, feeder cattle typical of the area. These animals have been on feed about 40 days. Note predominance of Brahma breeding; center, Brown Swiss dairy herd at University of Ceará. At right, typical small poultry farm flock of hens. Note excellent quality of these laying hens.

in management, animal age and feeding practices, more profit could be gained. For example, a grass fattening program would be feasible, using the offspring of low producing dairy stock crossed with Brahma bulls, in order to raise milk-fed calves.

There are many dairy herds in Fortaleza, some consisting of two or three animals and others of two or three hundred. One I had a chance to visit was quite impressive. The cows were of Brahma-Holstein cross, because most of the dairy farmers here feel they need the Brahma blood. Milk production averaged about 15 liters per day.

At the time we visited this fazenda, 80 cows were being milked. Excellent management and feeding practices were evident. It was interesting to learn that they were making silage. No dairies we visited are yet utilizing machine milking. Twenty percent of the dairies in Ceará belong to a cooperative, and all milk going into the milk shed is pasteurized. The other 80 percent is sold by private treaty or in the markets.

Need Concentrates For Swine

There is a great deal of interest in swine production here, but because of human competition for calories, high grain rations are prohibitively expensive. Protein supplements, such as meat meal, also are expensive and of poor quality. A partial solution may be establishment of a suitable legume beneath the many hectares of coconut palm groves in Ceará. Most of these groves are in high moisture

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Bill Saba is the newest member of The University of Arizona's agricultural team at the University of Ceará, in northeastern Brazil. As an animal nutritionist, he fills a wide gap in the team. His early impressions, given here, show that he already has considerable grasp and great interest in this assignment.

Current Officers of Agricultural Council



The Agricultural Council is made up of officers of all groups and organizations of students within this College of Agriculture. Phil Ogden, of the Watershed Management staff, is faculty adviser and coordinator for the group.

In the photo above are, front row, left to right:

Lucy Wing, ASUA senator; Cheryl Wild, Block and Bridle; Pat Gassert, secretary and also Beta Theta representative; Jim Brock, president of the council; Meredith Weltmer, Forestry Club; Fred Amator, Crops & Soils Club; Joe McQuistion, Ag. Engineering Club, and Roger

Kanerva, Aggie House.

Second row — Jerry Goodman, Range Management; Richard Hawkinson, Alpha Zeta; Gary Stone, Block & Bridle; Allen Bayles, Dairy Science, and Danny Anderson, Alpha Gamma Rho.

Third row — Ronald Rovey, treasurer and representative from Aggie House; Jerry Hawkes, Range Management; Guy Pense, Alpha Tau Alpha; Mike Chrisman, ASUA senator; Wayne Stuhr, Ag. Engineering, and John Hart, Crops & Soils.

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areas, or under irrigation, and could thus serve a dual purpose.

The University of Ceará has an excellent poultry setup. Much work has been done in the south of Brazil in poultry research, and several excellent strains have been introduced from the U. S. Hy Liners are used extensively in Ceará, and are of excellent quality.

Egg production varies, probably due to protein variations in the feed. Meat quality is excellent, with broilers being produced in 70 to 90 days. Some of the rations fed are produced commercially and are expensive, but most of the poultry farms I have visited are well managed and are making a profit.

May Add Storage Facilities

The University of Ceará has completed building a feed mill, and most

of the equipment for preparing and mixing rations has been installed. It soon will be in operation, making possible various feeding trials.

It is my belief that the greatest problem facing the Cearense livestock producer is lack of availability and storage of feeds. Ceará has a tremendous potential for forage production, both irrigated and dry-land, and when it is developed, livestock production will thrive.