ONA REPORTS

published in

THE FLORIDA CATTLEMAN AND LIVESTOCK JOURNAL

November - 2000

Managing Carpon Desmodium

By Rob Kalmbacher, Agronomist UF/IFAS, Range Cattle REC



For questions or comments regarding this publication contact

Dr. Rob Kalmbacher

Carpon desmodium is the most practical pasture legume available in central and south Florida. It is an excellent companion to bahiagrass because they are both adapted to similar soil and environmental conditions, and they both can survive under the management used by Florida cattlemen. Although it is not as nutritious as aeschynomene or stylosanthes, carpon desmodium is a much more reliable legume for most cattlemen.

Because it is a perennial and tolerant of grazing, we often believe that carpon desmodium will remain in a pasture indefinitely. I have noticed that the amount of carpon desmodium in pastures can change quite a lot from year to year. There are a number of factors that will determine abundance of carpon in a bahiagrass pasture, other than yearly changes in weather. For example, when bahiagrass is not grazed heavy enough through the summer, it can be too strong a competitor for carpon desmodium and the amount of legume will decline. Grazing on a 3 to 6 week rotation from late June to October and allowing carpon desmodium to regrow to about 6 inches is a good practice.

Nitrogen fertilization of bahiagrass-carpon desmodium mixtures will lead to the same result as under grazing: too much grass competition. If you need spring grazing, fertilize a bahiagrass pasture without carpon desmodium. Carpon desmodium will decline after 4 to 5 years with no added P and K. At least every other year, apply the equivalent of 300 lb/acre of an 0-10-20 fertilizer.

Individual carpon desmodium plants normally last 3 to 5 years, so they need to be replaced in the pasture. There probably are adequate seed reserves of carpon desmodium in the soil to allow new plants to be recruited into the pasture if carpon desmodium is rotationally grazed. However, you can assure that there will be plenty of seed by removing cattle from the pasture after carpon desmodium begins to flower in early October and keeping cattle out until mid-November. Utilize the pasture heavily after seed

set. Seed that is eaten will pass through cows, and they do a good job of distributing its seed. In order to get the seed to grow the following spring, it is essential that you allow cows to keep the bahiagrass well grazed (2-3 inch stubble height) from March until the first few weeks of the rainy season. This allows seedlings to have adequate sunlight and assures that they will have constant soil moisture. Carpon desmodium seedlings have poor drought tolerance, so you can expect a few "waves" of seedlings as it rains (seed germinates) and dries out (seedlings die). Get down on your knees and look for those seedlings in early summer.

Root knot nematodes can feed on carpon desmodium roots. The 'Florida' variety released by Dr. Al Kretschmer in 1979 was susceptible to root knot nematode. Mature plants are weakened, but seedlings are very vulnerable. I suspect that in dry years, such as we have experience recently, that nematodes are a greater factor than they normally are to weaken stands and kill seedlings.