

STRETCHING HAY

December 2008 Georgia Cattleman
Dennis Hancock, Forage Extension Specialist
The University of Georgia

My high school shop teacher loved to send students to the tool room for a “board stretcher.” Of course, those of us with even a little common sense were always eager to perpetuate the joke on those who didn’t know any better.

If you had a similar trick played on you, you may find it hard to believe when I say there really are hay stretchers out there. With hay costs being at an all time high and little relief in sight, cattlemen in Georgia have more cause than ever to stretch their haystacks. This article will present a handful of ways that will help you stretch hay.

Cover It

Hay stored on the ground with no cover will result in major losses. Weather damages the outside layer of the hay. This weathered layer will often be at least 4 inches deep around the whole bale. In many years, weathering can result in damaged layers that are over 8 inches thick. This weathered layer essentially becomes like a thatch roof, but not before the hay becomes essentially useless for animal feed. The weathered layer will be a total loss. This can result in a major loss of hay. For example, a 5 ft bale with a weathered layer that is 4 inches deep results in 25% hay loss (Figure 1). These days, there’s a major cost to that amount of loss! As many of you have heard me say: “if you store hay outside, you are paying for a barn whether you want to or not.”

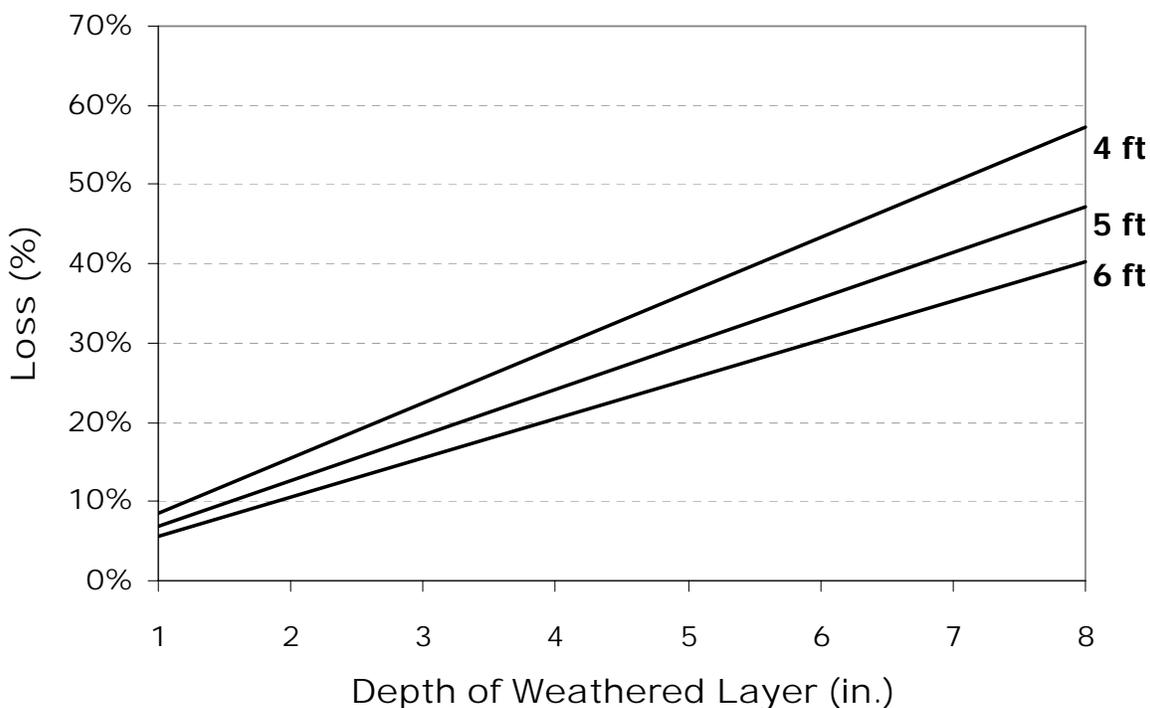


Figure 1. The amount of loss associated with increasing weathered layer depths for round hay bales that are 4, 5, and 6 ft. in diameter.

Use a Ring

One of the best strategies for stretching hay is by doing a better job of feeding it. If hay is fed on the ground without any device to keep the animals from treading or soiling the forage, feeding-related losses may be fairly high (Table 1). These losses can be reduced by using a hay ring to limit the animals' access to the hay. As a result, hay rings can keep feeding losses below 10%. Newer, cone-style hay feeders can elevate the hay off the ground and further reduce feeding losses.

Table 1. Range in feeding losses that are typical for different methods of feeding hay.

Method	Waste, %
<i>Enclosed Feeders</i>	
Cone	2 - 5
Ring	4 - 10
Trailer	10 - 13
Bale Cradle	15 - 20
<i>No Protection, Fed on the Ground</i>	
Consumed in < 4 hrs	7 - 12
Unlimited Access	> 40

Certainly, hay can be fed directly on the ground with very little waste. But, the amount of hay that is fed needs to be only what the animals can clean up in less than 4 hrs.

Restrict Access

Another strategy for stretching hay is to limit the time that the cattle have access to the forage. New research out of the Midwest indicates that mature cows can have their access to hay restricted to 8 hours without loss in weight or body condition score. Under the conditions of their study, this strategy helped stretch the hay by an extra 15%.

Restricting access can help stretch hay, but don't take it too far. In this same research, access to hay was restricted to only 4 hours and the cows' body condition score and weight were reduced. If you are really trying to stretch hay with restricted access, be sure to separate out your young (heifers and 1st/2nd-calf cows) and thin cows that need to gain or regain weight and condition. Boss cows tend to get their fill, but they can root out thinner and less-dominant animals.

One caution, however: **Be sure that you are feeding good quality forage.** If their access is restricted, every bite has to count. Being able to keep weight and condition on your animals will be contingent on feeding high quality hay. If you are considering this strategy for stretching hay, be sure to test your hay for quality. If you are unsure how to test hay or need advice on how to get an accurate sample, consult with your local County Extension Agent or follow the National Forage Testing Association's "Recommended Principles for Proper Hay Sampling" found here: <http://www.foragetesting.org/files/hayprotocol.pdf>.

For more information on this and other forage management subjects, check out our website at www.georgiaforages.com or contact your local University of Georgia Cooperative Extension office at 1-800-ASK-UGA1.