

### Keeping Forage-Livestock Producers in Kentucky Informed Dr. Ray Smith and Echo Gotsick, MS editors

#### December 2024

#### Dr. Jimmy Henning Retiring after 35+ years

Dr. Jimmy Henning will retire at the end of this year and we want to recognize him and thank him for all his outstanding contributions. Jimmy has been involved professionally in forage extension and applied research since 1986. Throughout that time, he has been a leader in all things forage in KY and across the country. During the years he was at the University of Missouri Jimmy single-handedly ran the mobile forage testing unit which was one of the first in the country. When he came to UK in 1990 as a forage specialist, he was one of the leaders introducing no-till establishment for forages. Jimmy initiated a program to show the value of improved red clover varieties which resulted in a 500% increase in their use in the state. He restarted the UK Forage Variety testing program which is now one of the largest in the country. Jimmy was a cofounder of the KY Grazing Schools in 1996. After Missouri, the KY Grazing Schools were some of the first in the United States. Jimmy was instrumental in initiating the KDA Hay Testing program and organizing the forage components of the KY Ag Development Board's cost share programs (now under CAIP).

As AFGC President in 1998 he was the main organizer for the first joint AFGC/SRM Conference. During his career Jimmy has given well over 1000 extension presentations and forage written hundreds of extension publications and popular press articles. When he was Assistant Director of the UK Ag Extension program (2003-2007) and Associate Dean for UK Cooperative Extension (2007-2017) he continued to be a strong supporter of forages both for county agents and for specialists even though he was overseeing 360 county agents and 1000 total staff across the state.

In addition to all these accomplishments, when Jimmy stepped down from administration in 2017 he didn't just sit on his laurels. He initiated one of the most productive periods of his career with national leading forage photography, hay and baleage research, soil fertility research, helping coordinate the East, Central and Southcentral KY Hay contests, directing the College of Agriculture's STO online Master's program, teaching the UK Forages

#### Forage Timely Tips: May

- Begin utilizing stockpiled pastures. Graze pastures with orchardgrass and clovers first. Save tall fescue pastures for late winter grazing.
- Using polywire, strip graze stockpiled pasture to improve utilization. Start at the water source and allocate enough forage for 2-3 days. Back fencing is not necessary.
- Make plans to frost seed red and white clover onto closely grazed tall fescue pastures in February. Secure seed now since supplies of good varieties will be tight.
- Some hay can be fed as stockpiled grass or grazed to stretch grass.
- Minimize hay waste by utilizing ring feeders.

course, developing the first UK online forages course, writing a biweekly column for the Farmer's Pride magazine, and much more. And most importantly, Jimmy was available to county agents and producers across the state every day (and many nights) of his career. Thank-you Jimmy. We are hosting a retirement gathering for Jimmy on Dec. 16 at the Fayette County extension office. If you are able, feel free to stop-in anytime between 2:30 and 5:00



**Forages at KCA—Jan. 17th** If you are attending the KY Cattleman's Association meeting in January in Owensboro,

make sure to attend the Forages at KCA session. It will be held the second afternoon of the meeting, Jan 17 from 2:25 to 4:30. This year's theme is **Matching Animal Genetics to Forage Resources** and will feature two outstanding forage/livestock producers. Dan Glenn will talk about "Optimizing Production with a Forage Focused System" based on his operation in Fitzgerald, GA- Deep Grass Graziers. Dalton Bennett from Knoll Crest Farm in Redhouse, VA will share about "Genetics for Tall Fescue Based Systems." We look forward to seeing many of you there.

#### Alfalfa and Stored Forage Conference-Feb. 25

The 2025 Alfalfa and Stored Forage Conference will be held Feb. 25 from 8:00 to 3:30 at the Fayette County Extension office, 1140 Harry Sykes Way, Lexington, KY. The conference will provide important updates on alfalfa production and feature how to produce grass hay for premium markets. The following presentations will be part of the conference. 1-Everything I Ever Needed to Know about Armyworms, 2-Armyworm Control Methods: What to Spray and When, 3-What's New in Alfalfa Varieties, 4-What do Horse Owners Want and Why, 5-What We Can Learn from the Results of the KY Hay Contests, and 6-Emerging Markets for Unique Forage Species. The day will close with four top KY hay producers discussing 7-Orchardgrass, Timothy, Teff, and Fescue/mixed hay production. We have asked them to be very practical and explain their successful methods for establishment, fertilizing, harvesting and marketing. And then we will open the floor to questions. The cost is \$45 and students are only \$15. Go to the UK Forage Website under events to register or mail a check with your name to Krista Lea, N222 Agriculture North, Univ. of Kentucky, Lexington, KY 40546-0091.

## Is this hay any good – Understanding Relative Forage Quality

There are lots of ways to answer the question 'Is my hay any good?' Producers know to look at the crude protein (CP) content and know a higher value means higher quality. Some will go to TDN, or total digestible nutrients, and make a judgement from that value. For some time, we have had a term, Relative Feed Value (RFV), as a useful index for forage quality. The RFV index was an effective way to communicate forage quality, but unfortunately it was designed to work primarily with alfalfa and alfalfa containing hays. RFV discriminates against grasses.

Now there is a new forage index, Relative Forage Quality (RFQ), that allows one number to describe the value of hay across all types it uses improved formulas for digestibility and intake that take into account crude protein, non-fiber carbohydrates, the fat content and the digestibility of the fiber component. RFQ also has different intake and digestibility equations for grasses and legumes. The net result is that RFQ is an index that can be used to compare across all forage types. An RFQ value of 140 would mean the same whether it was from an alfalfa or a grass sample. In short, RFQ or Relative Forage Quality provides the best hay quality value to answer the question, "Is my hay any good?" To get RFQ on one of your future forage tests, consult the commercial lab's menu of available forage tests.

This is an excerpt of Dr. Henning's Forage Doctor column in the Nov. 7 issue of Farmer's Pride. For the full article go to: www.thefarmerspride.com.

#### Are you baling soil?

As you are considering what equipment to buy for next year's hay making season or are you just looking at your hay test results and wondering why ash content is reported. A recent article by Rebecca Kern-Lunbery (Ward Laboratories) in Progressive Forage showed that many producers bale more soil than they want to. The following is an excerpt of this article:

Make sure your forage samples don't contain too much ash based on your hay quality report (which can mean soil contamination). Ash is the total mineral content of a feed and has two sources. Endogenous ash is from the plant and is bioavailable, providing micronutrients to the animal. Exogenous ash is from soil contamination of the feed. Most forages range between 8%-10% ash with 4%-6% representing the endogenous portion. Extremely soil-contaminated forages could contain as much as 25% ash. So, almost one-quarter of the dry matter in that forage is just dirt. A good goal is to make and feed hay with less than 15% ash.

So what causes soil contamination of harvested forages? One common reason that soil can end up in our stored forages is dry conditions. When field conditions are dryer, it is easier for the rake to pull up soil particles and incorporate them into the bale. And there have been many months with dry conditions in recent years. What can we do to prevent soil contamination of our stored forages? Here are four tips to prevent contaminating stored forages with soil:

1. Cut forages 3-4 inches off the ground. This can help optimize forage quality by not incorporating the most fibrous portion of the plant. More importantly, this practice will leave more ground cover and give some protection from soil erosion. It will also allow the forage to regrow faster.

of forages. RFQ is a better index because See Diue. 2. Rake as little as possible. I have

known some producers who live in climates where humidity is an issue, and they rake the windrows to turn them to ensure the hay is completely dry. Avoid this practice unless it is absolutely necessary.

3. *Pay attention and adjust your equipment.* Prior to cutting or baling, ensure your equipment is properly adjusted to prevent unnecessary disturbance of the ground. Also, if you are seeing a trail of dust, stop and adjust things to reduce the amount of soil being incorporated into the bale.

*Graze.* Forgoing the harvesting process will ensure animals have the ability to choose the forage they consume and eliminate the possibility of consuming a lot of dirt.

You might ask "What's the harm in my cattle eating a little dirt?" A little dirt is ok, but if there is much dirt it can affect animal health. The problem with soil-contaminated feeds is that the soil could cause compaction within the omasum, abomasum or beginning of the small intestine. An impaction would not allow other digesta to pass through. An impaction could cause cattle to go off feed, if it is serious enough. The more likely issue would be a decrease in performance due to the dry matter intake (DMI) the ash is taking up. Because cattle typically consume 2% of their bodyweight in dry matter, consumption of soil-contaminated feed can result in a considerable amount of the feed having no nutritional value, thereby resulting in decreased performance for the animal.

In addition to the risk of impaction, soil contamination can also affect mineral nutrition. Iron from the soil can interfere with copper absorption at 250 parts per million. Also, the bioavailability of minerals from the soil is low. So if you are feeding a forage high in ash, mix it with feeds that have a low ash content to minimize impaction risk and performance losses. Furthermore, if high iron levels are present, increased copper supplementation might be necessary.

In conclusion, ash is an often-overlooked parameter on forage reports. At high levels, it can indicate a soil contamination issue. Soil in forages can reduce forage quality and have a negative impact on livestock health. Monitoring ash levels in forages can be important in identifying areas for forage production improvement as well as ensuring forages are managed and fed out to ensure top-tier nutrition and health for our livestock. To read Rebecca's full article go to the Progressive Forage website. The direct link is <a href="https://www.agproud.com/topics/102-progressive-forage">https://www.agproud.com/topics/102-progressive-forage</a>

## Fescue eradication and improved management increases profits for Central Kentucky Thoroughbred Farm-UK Success Story

A central Kentucky thoroughbred horse farm experienced a high incidence of fescue toxicosis symptoms in pregnant and foaling mares during early 2017. The UK Plant and Soil Science Forage Group was contacted by the farm at the advice of the consulting veterinarian. After a farm visit, the farm agreed to a program of pasture evaluation. Fields were samples for species composition, endophyte infection level, and ergovaline content. After being presented results showing damaging levels of infected tall fescue, the farm began an aggressive program of fescue eradication in some fields and complete re-establishment in two others. They also changed their pasture usage for foaling mares in the 2018 season to avoid exposure to toxic tall fescue. As a result of the knowledge of fescue presence and fescue eradication in selected pastures, the farm was able to avoid exposing pregnant mares to toxic tall fescue. As a result, the farm experienced no difficulty in foaling (dystocia) and fewer thickened placentas (red bags) and no foal losses due to tall fescue in from 2018-2024. With the high value of thoroughbred horses, dealing with toxic fescue led to substantial improved profitability for the farm. Specialists involved: Jimmy Henning, Ray Smith and Krista Lea

University of Kentucky Forage Extension Program N-222 Ag. Science Center North 1100 S. Limestone Lexington, KY 40546

# Forage News



Upcoming Events (see Forage website for details and to register, click on EVENTS)

Jan. 12-14— AFGC Conference, Orlando, FL Jan. 17 – Forages at KCA, Owensboro, KY Jan. 29 – Equines and Endophyte Workshop, Lexington, KY Feb. 25 - Alfalfa and Stored Forage Conference, Lexington, KY Feb. 27 – Pastures Please Equine Conference, Lexington, KY Mar. 6 – Tall Fescue Workshop, Grayson Co Extension office. April 29-30 – Beginning Grazing School, Logan County Sept. 24-25 – Intermediate Grazing School, Versailles, KY

Forage Website www.forages.ca.uky.edu.