Time To Start Managing Ecosystems

AGRI-VIEWS

by Chuck Otte, Geary County Extension Agent

Kansas has several million acres of tallgrass prairie in the Flint Hills, the largest remaining portion of native tallgrass prairie anywhere in the world. Thanks to the shallow soils and abundant rocky substrate, often very shallow, this land has not and will not be tilled and turned into cropland. Which means that it will remain as forage for herbivores as it has been for millennia. Many of the native herbivores are gone or greatly diminished in numbers leaving the majority of the grazing to herds of domestic cattle.

For over 150 years various forms of cattle production have occurred in the lush prairies of the Flint Hills. For much of that time that pastures have been managed, or often mis-managed, to benefit the cattle. Cattle producers sell pounds of beef more so than pounds of grass so it only makes sense that the focus has often been on what is best for the cattle.

For most of four decades I have watched Flint Hills pastures ebb and flow through weather changes, landlord changes and tenant changes. I've carefully watched pastures on either side of a barbed-wire fence change in condition and composition based on how each side was managed. The tallgrass prairie is amazingly resilient, but it isn't indestructible. In many pastures we have been "mining" grass for decades as average cattle size has increased and stocking rates have remained unchanged for 50 or 60 years. This isn't sustainable and if adjustments aren't made we'll slowly be destroying the very resource that we depend on.

We need to stop looking at the grasslands as merely a source of food for our cattle and start looking at it as the ecosystem that we must manage in a symbiotic fashion WITH the cattle herd. Symbiosis is a biological concept that we run into regularly but may not be familiar with the word itself. From the dictionary, symbiosis is defined as the interaction between two different organisms living in close physical association, typically to the advantage of both. If that doesn't describe what we are, or should be, working for with our tallgrass prairies and cattle herds, I don't know what does.

Obviously I'm not going to be able to explain to you how to do that in one article with less than 700 words. I'm just trying to plant a few seeds of awareness, possibly a few seeds of change. No one is going to go out tomorrow and totally change how they are doing things. It needs to be a gradual evolution of land owners, pasture managers and cow herd managers talking and discussing what will be mutually beneficial for the prairie ecosystem as well as the livestock who are harvesting the forage. People are already doing it and you can see the results as you look at the pastures as you drive through the Flint Hills.

It needs to be large property owners as well as small property owners all understanding many different concepts. Concepts that include an understanding of the complexity of the plant communities in the prairies and how each reacts individually and collectively to weather impacts, climate change, and management. It means learning things like carrying capacity, stocking rates, and animal unit months. It may also mean land owners and livestock owners adjusting their profit goals to match the realities of the resource.

The easiest place to start a journey is to begin where you are. As one growing season winds down and heads into winter it gives us a great opportunity to study what's going on out in the pasture and examine the amazing diversity that is there. We take the time to see where we are and what direction we need to head. And we also realize that it's a journey we'll be on forever, not a trip we'll take over just a year or two.