



Grassroots

VOLUME 16 ISSUE 4

MAY 2014

BOARD OF DIRECTORS

James Faulstich,
Chair

Dan Rasmussen,
Vice Chair

Larry Wagner, Sec-
retary/Treasurer

Dale Boydston

Jim Kopriva

Doug Sieck

Bill Slovek

INSIDE THIS ISSUE:

Changing plant species by grazing 2

Dung Beetles: A Big Deal 3

SWO Grazing Workshop 4

Grazing Workshop Continued 5

Leopold Tour 5

Getting Started Continued 6

Flushing Bars for Wildlife 7

Getting the Next Generation Started by Jim Kopriva



The wildlife people know if you want wildlife the first step is to create or improve habitat. As simple as this sounds the majority of the population doesn't seem able to transfer this basic concept to young farmers and ranchers. If we want to encourage young people to stay in our rural communities, we must provide habitat for young folks. Our children are truly our most valuable resource, more precious than gold. Young operators bring many benefits to our communities, we need their energy. We need their creativity. We need their labor and we need their children. Our nation needs a younger and well established population of farmers and ranchers. It is indicative of larger issues every time we see the statistical age of the average farmer increase. How can our country feel secure about the stability of its food supply as the average farmer is nearing retirement age?

Finding a young person interested in agriculture is getting to be a rare thing. Not many educated young people who didn't grow up in production agriculture would consider an occupation that demands regular long days with inconsistent compensation and high financial risk. No there must be something deep in the soul of a young person who has enough experience to know well and accept the risks involved and the level of effort demanded to become established. It is even more rare for these young people to find a mate who is equally motivated and willing to stand beside her man planning, managing, cutting corners, often working part-time in town, while raising a nest full of children.

All parents would love to be in a position to set their children up in agriculture. The problem is parents of young beginning farmers are middle aged operators who are struggling to hang on to sufficient land base let alone jump start their children into business. It needs to become more of a community project. It takes the concerted effort of many community members to create this vital habitat, which would allow and encourage our young folks to stay in our communities. It requires commitment and constitution because it requires long term financial compromise. Land owners need to be prepared to allow good honest hard working young families to rent land without competing with the huge operations who are very capable to out bidding beginners in lease auctions.

Getting Started Continued on Page 6

Changing Plant Species by Grazing by Rick Smith

Grazing management could be simply knowing the vulnerability and thrive ability of existing plants in your pastures. Pastures or ranges that have multiple plant species growing are usually a desired goal for range specialists, but some traditional thinkers don't understand how a diverse plant community is an advantage. Sometimes the diversity is viewed as stealing or wasting nutrients that could have produced more of a single or major grass species that exists now or did in the past. The season of the year that growth occurs, depth of rooting system and how minerals or compounds are accumulated within the plant structure may have positive or negative effects on other plants or livestock that can consume them. What could possibly be a benefit of a misplaced plant (weed) in your pasture? Maybe it brings to the soil surface nutrients or minerals that are below the grasses rooting zone. Maybe it facilitates deeper water holding capabilities. Maybe it acts as a snow catch during the winter or encourages birds to hang around the cow herd and attack parasite larvae. Maybe it offers some grazing outside of the normal grazing season by being earlier or holding its nutrient value long into the winter. It can also be said that an excess or dominance of any plant species usually is not desirable, be it consumed forage or a species that livestock cannot tolerate as a dietary mainstay. So before you make a calculated plan to remove or reduce plant species, evaluate if any benefits are being derived from those species.

Grazing timing and intensity can be used as an effective tool to adjust the ratio of plant species in your pasture. Most plants have a critical time necessary to gain an advantage over other plant species. This is also their vulnerable time and your opportunity to effect change. The shorter a plant's time to maturity, the more intense and critical the time period to target its control. Most annuals and biennials establish or expand in cool weather (vulnerable) and being able to graze these plants intense enough to eliminate seed production will benefit forages that grow under warmer temperatures by reducing depletion of moisture prior to their growth. For perennial weed or invasive grass control, the same intensity can be used but more emphasis should be on avoiding grazing during the time when your most desirable species are experiencing their most rapid growth (thriving). Learn not only how, but when your grass grows to its advantage.

Sometimes issues get confused or terms and words are misunderstood. Recently a producer explained his use of rest and rotation as grazing one week and four weeks rest repeated 5 times over the summer on each pasture. No change for hot or cold, wet or dry, early or late season, just look at the calendar and move. The problem is his concept of rest meaning no livestock. The term rest should be related to 'recovery time' from grazing. Recovery means getting better from the current state and not just simply being idle. The timing of making a move should be determined by the condition to where you are going. If you are just resting your pastures without recovery, slow down until it occurs or destock. No grazing plan creates more undesirable plant species than ignoring the recovery periods of desirable grazing plants.

Rick Smith is a farmer/rancher near Hayti, SD and the Lake Poinsett Watershed Coordinator. He can be contacted at 605-886-6513

Dung Beetles: A Big Deal

by Garnet Perman

Dung beetles are a hot topic at range conferences as one of the indicators to look for when moving to a more holistic management style. When long acting residual pour-ons such as Warbex or Ivomec were introduced to control flies and lice, dung beetles became collateral damage. Recent research shows that the beetles are an important partner in livestock and grass management. By hurrying the decomposition of dung, these beetles play a role in biological pest control and soil health. Three types of beetles, tumblers, tunnelers and dwellers, can quickly break up a dung pat by either making holes in it, or dispersing it, thereby depriving fly larva and some parasites of a hospitable place to live and reproduce. Their activity also recycles nutrients, and increases organic matter and water permeability in the soil.

Larry Wagner, from Chamberlain, changed his fly management program about 6 years ago. He started using Cydectin, which is more dung beetle friendly, in the fall only. The cows then go to cornstalks so the fecal material doesn't land on his pastures until the chemical concentration in the manure wears off. He's seen an increase in the number and variety of dung beetles since making the change, with what he calls "the little ones" being predominate. "It just amazes me how quickly fecal pats disappear," he said. He still has some flies, but feels like the population is less than it was. He will spray if the fly load becomes too high.

Randy Holmquist, from Reliance, doesn't pour his own cattle at all, and pours custom grazed cattle in the fall before going to cornstalks. Because he grazes his cattle and the custom cattle separately, some of his pastures have no pour on residue ever. A variety of dung beetles are present all over the ranch. "I don't know if I have any more flies than when I did pour," he said. Lice have not been a big problem.

Charlie Totton, from Chamberlain, follows the same procedure as Holmquist and Wagner, using Cydectin in the fall after frost. "Flies don't bother me except for pinkeye," he said. If it becomes a real problem, he'll use a rub to help control the flies.

All three producers employ intensive grazing for at least part of the growing season. Totton feels that continually moving to fresh pasture also helps reduce flies. He noted that all the cow pies left behind have holes, so he hopes they dry out faster than flies can hatch. Holmquist thinks the concentration of manure during MOB grazing helps attract dung beetles. Totton and Holmquist both commented that because they are spending more time in the pasture, they observe more about what's happening on the land.

Although it's difficult to separate the effects of intensive grazing and dung beetle activity on forage production, all three producers report very positive results in plant growth and diversity. The three types of beetles bury manure in the soil. Some studies indicate that dung beetle activity may be as effective as chemical fertilizers. Wagner noted that "as the soil gets better, you see more varieties of them (dung beetles). It's really a win-win."

Totton, Holmquist and Wagner all suggested Dave Steffen, Burke, SD (605-775-9112) and George Wagner, Winnetoon, NE as good resources for anyone who wants to know more about dung beetles. Wagner commented that the Egyptian scarab, a motif used in religious artifacts, is a dung beetle. They may be nearly as precious to the grass managers of the Northern Plains.

Garnet Perman is a freelance writer and ranches with her husband, Lyle, near Lowry, SD

The Green Side Up: SWO Grazing Workshop

by Pete Bauman and Lorne Aadland



Bison grazing in eastern South Dakota
(Photo by A. Smart)

Nearly 40 persons were in attendance on Wednesday, April 30th as the Sisseton Wahpeton Oyate (SWO) Realty & Natural Resources staff hosted a Grazing Workshop in conjunction with Natural Resource Conservation Service (NRCS), SDSU Extension, Roberts Conservation District, and the SD Grassland Coalition. The workshop was held at the new SWO Administration Building at Agency Village. Generally, this area of South Dakota hasn't had the benefit of many grassland or grazing workshops over the last few years. With the recent changes to SWO land management staff, event organizers believed a workshop would be an excellent opportunity to share information on the SWO's grazing programs and land management plans as well as an opportunity to showcase the new facility.

Lorne Aadland NRCS Tribal Liaison hosted the event and welcomed all in attendance. After brief introductions, SWO Realty Manager Chad Ward discussed the new leasing policy for SWO pastures and other lands. Tribal Natural Resource Manager Justin German, along with Aadland, provided a brief history and update on the tribe's bison and natural resources programs and clarified how the tribe addresses resource concerns on tribal and BIA managed trust lands. Aadland led a discussion related to concerns regarding the tribe's Midwest prairies, which suffer from an invasion of cool season exotic grasses such as Kentucky bluegrass and smooth brome. Aadland explained the tribe desires to manage for native warm and cool season grasses on tribal range and hay lands and he discussed opportunities for lessees to help the tribe achieve this goal.

Several other speakers presented throughout the day. Pete Bauman, SDSU Extension Range Field Specialist, presented talks on implementing innovative rangeland water and fence systems, simple monitoring tools, and along with Charlene Miller (SWO Fish and Wildlife) presented information on invasive species management and the role of broadleaf plants in pastures. Matt Hubers, Grant County NRCS District Conservationist gave an excellent talk on the options and opportunities for producers to partner with NRCS on pasture management projects ranging from water to fence to grassland restoration. Hubers primarily focused on programs funded under the Environmental Quality Incentives Program (EQIP) but also touched on other options producers could explore.

Local ranchers Mike McKernan and Tellus Waddell shared their experiences with cattle ranching in the Summit Hills region of Grant County. McKernan highlighted his work implementing an EQIP contract for fence and water systems on a private ranch and shared the pros and cons of developing rotational grazing infrastructure under EQIP. McKernan also shared experience in working with NRCS on a fairly new interior fence design that he is developing using single-strand high tensile wire and a flexible composite post. Waddell shared information on his grazing rotation philosophies, cattle management, limited chemical use, and native seed production.

Grazing Workshop *continued*

NRCS Agronomist Eric Barsness, Lake Poinsett Watershed Project Coordinator Rick Smith, and NRCS State Range Conservationist Stan Boltz provided the attendees with an in-depth demonstration of NRCS’s Rainfall Simulator. This hands-on presentation highlighted how various tillage schemes and grazing management can greatly affect the water holding capacity and runoff of water on the landscape. The day wrapped up with additional presentations by Barsness and Smith on overall rangeland health and the potential for cover crops to be integrated into various grazing and cropping scenarios.

A general theme that all speakers touched on throughout the day was the need to curb broadcast applications of herbicides in pastures for broadleaf plant control, citing the impacts that chemicals are having on range plant diversity, limiting livestock forage selection and decreasing habitat for other valuable species.

A bison burger lunch was provided by the SWO staff.

*Pete Bauman is an Extension Range Field Specialist in Watertown, SD
Lorne Aadland (NRCS liaison to the Sisseton Wahpeton Oyate Tribe)*



Stan Boltz, demonstrating the rainfall simulator at the 2013 Bird Tour (Photo by A. Smart)



Leopold Award Tour Set for July 2 *by Sandy Smart*



Perman family (Photo credits: Sand County Foundation)

(Posted on April 22, 2014 by Chris Schellpfeffer)

Sand County Foundation, the South Dakota Cattlemen’s Association and the South Dakota Grassland Coalition announced the Rock Hills Ranch as the recipient of the 2014 Leopold Conservation Award. The award honors South Dakota landowner achievement in voluntary stewardship and management of natural resources.

Rock Hills Ranch of Lowry is owned and operated by Lyle and Garnet Perman along with their son Luke and his wife Naomi. The Permans raise crops and Angus cattle, and manage 7,500 acres, most of it grassland. They have come to use an Aldo Leopold quote as a guidepost: “The landscape of any farm is the owner’s portrait of himself.” With that perspective, the Permans take a holistic approach to managing their land, livestock, wildlife and cultural resources.

A ranch tour is scheduled for Wednesday, July 2. The ranch is located 1/4 mile north and 1 mile west of Lowry, SD.

Getting Started continued by Jim Kopriva

This effort will take persistence for it may well take 20 years before they can go toe to toe with the neighborhood heavyweights. What a beautiful obituary it would be for the family of a community leader to be able to say he helped 6 young families to enter into the business. How much more impressive than a few more zeroes on the checking account statement. Ink on paper is totally out-classed by young people in the country every time. Maybe he loaned them equipment. Maybe he put cows out on shares rather than invest in Wall Street. Maybe he sold land on a contract for deed at a low interest rate. Maybe many things, but certainly he shared with them advice and encouragement; he became their mentor.

Near the top in importance comes livestock and pasture. Livestock means commitment, responsibility labor 24-7-365. Livestock is unique because a young guy can grow in bite sized increments. He can build sweat equity. Build his net worth and become commercially bankable. Grain production is so much more capital intensive. In order to get the modern technology he must get a large modern (and expensive) line of equipment. Then he must borrow funds to get the rent paid and seed fertilizer and chemicals. Then as margins shrink he must get out there and outbid his neighbor in order to farm enough acres to justify all the expensive and shiny iron he is paying for. As the clock ticks with every minute the iron depreciates and becomes steadily less desirable, ultimately this machinery must be replaced. This is entirely different with livestock. He may be able to buy a handful older cows and rent some odd parcels of grass, too small for more established operators to care about. Then with time and effort, build a small herd. Perhaps learn how to artificially inseminate and buy some good maternal bull semen and keep his heifers until he has accumulated a respectable set of cows without actually going into debt. It takes habitat and willing family and neighbors full well knowing all the odds are stacked against this scratch start venture. The wise older operator perhaps nearing retirement age can see that by helping this young guy get started he will actually be helping himself and the whole community. Perhaps by helping this new startup the older guy will have someone around to help him with chores or countless other jobs.

I noticed a pole bearer in a funeral awhile back. It caught my eye because he normally walked with a cane. In fact the only reason he was able to shuffle along with the group is that the able bodied younger men were able to carry the weight of the casket and the older pole bearer also. To me the take home question was, how long will it be before there isn't enough young people around to carry our remains to its final resting place. Maybe we will have to hire migrant pole bearers. Maybe custom pole bearing will be a new service industry.

Considering the large operators maybe farming 20,000 acres and actively seeking even more land to rent, I have to wonder if 20,000 acres doesn't make them happy, do they really think another quarter will. Instead of renting it to the big boys, maybe the landowner would have somebody in the neighborhood to dig him out from a blizzard, or haul him to town for a doctor visit, or have his kids mow the lawn. Greed isn't just in the eye of the big farmer it is also on the shoulder of the landowner and his children.

Jim Kopriva farms and ranches near Raymond, SD, serves on the Board of Directors of the SDGC, and was the recipient of the 2012 Leopold Conservation Award

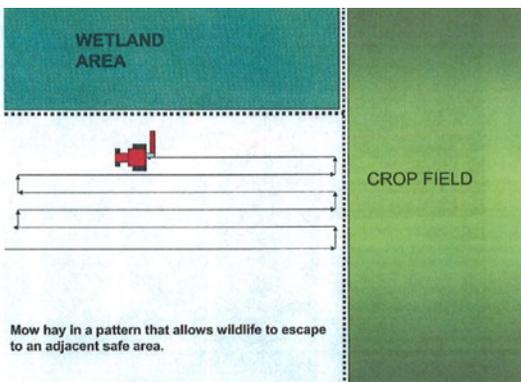
Flushing Bars for Wildlife by Mike Blaalid

As our cold, seemingly never ending, winter wore on, the first thing on everyone's mind was the green-up that warmer spring temperatures and longer days would bring. That exact thing is what wildlife prepare themselves for early. Along with storing enough fat reserves to get them through harsh winter conditions, it is equally important for wildlife to come out of winter in good physical condition to take on the stresses and challenges that the breeding season brings. This is very important to upland nesting birds, like pheasants, as a decrease in body condition leads to a decrease in clutch size as well as an increase in hen mortality.

If pheasants are fortunate enough to enter the breeding season in good physical condition, they are not completely out of harm's way. As hayland begins to green-up in the spring, these areas provide a very attractive area for hens seeking a quality nest site. However, these same areas also provide farmers and ranchers with livestock forage. As a result, many hens are incidentally lost due to normal spring haying operations. But, there is a solution for incidental hen mortality, and the answer is the use of a flushing bar. A flushing bar is a device that typically is mounted on the front of a tractor that precedes the implement being used for haying. A flushing bar creates a disturbance in advance of the implement to allow extra time for the nesting bird to flush to avoid injury or death.



Although the nest is normally destroyed, pheasants are resilient nesters and the majority will re-nest in nearby undisturbed cover. By using a flushing bar, not only will more hens survive the breeding and nesting seasons but many will also go on to successfully hatch a clutch leading to a potential increase in annual bird populations which will possibly lead to subsequent population growth in later years.



In addition to using a flushing bar, simply modifying haying patterns may be an additional option to help save wildlife utilizing hay fields. Conventionally, hay fields are cut starting from the outside and working towards the opposite edge of the field or from the outside into the center of the field. Haying in this manner has a tendency to concentrate wildlife in a continually shrinking area of cover or forces wildlife into the open exposing them to predation. By starting in the center and working out, wildlife will have escape cover to decrease their susceptibility to haying operations and predation.

Incorporating one or both of these wildlife friendly methods will have a positive effect on game and non-game species of wildlife alike. For landowners interested in learning more about flushing bars, they are urged to contact their local Pheasants Forever Farm Bill Biologist through their local USDA Service Center.

Mike Blaalid is a Farm Bill Wildlife Biologist for Pheasants Forever, Inc. and Quail Forever out of Mitchell, SD. For more information contact Mike at 605-770-6859 or email at mblaalid@pheasantsforever.org



Sandy Smart
Box 2170, ASC 219, SDSU
Brookings, SD 57007

Calendar of Events

Event	Date	Location	Contact Person	Phone
Range Camp	June 3-5	Sturgis	Tate Lantz	605-390-8049
			Dave Ollila	605-394-1722
Bird Tour	June 13-14	Union Center	Judge Jessop	605-280-0127
Rangeland and Soils Days	June 24-25	Chamberlain	Tina DeHaai	605-734-5953 ext 3
			Dave Ollila	605-394-1722
Leopold Ranch Tour	July 2	Lowry	Judge Jessop	605-280-0127
Allan Savory - SDSU Talk	Sep 10	Brookings	Sandy Smart	605-688-4017
Allan Savory - Ranch Tour	Sep 11	Hayti	Judge Jessop	605-280-0127
SD Grazing School	Sep 15-19	Chamberlain	Judge Jessop	605-280-0127

Please remit any comments, suggestions, or topics deemed necessary for further review to: Sandy Smart, SDSU Box 2170, Brookings, SD 57007, alexander.smart@sdstate.edu, (605) 688-4017