SOUTH DAKOTA GRASSLAND COALITION

GRASSROOTS

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Climate Change

With all the talk about global warming, especially Al Gore's movie, "An Inconvenient Truth", it might scare us a little. If we can even stop it, is up for debate. In reality, the frightening things in life are decisions that affect our economic, social, and health, not the consequences of global warming. The latest climate forecast models indicate that the weak El Niño over the Pacific Ocean is transitioning to neutral and may convert to a weak La Niña later this summer. The El Niño/ La Niña are defined by sea surface temperatures in the Pacific Ocean along the equator. Warmer temperatures indicate an El Niño, and cooler, sea surface temperature indicate a La Niña. The oceans surface temperature gives rise to "somewhat" predictable weather systems that affect the continental US. The last six years the Pacific Ocean has predominantly been in a neutral or El Niño position. The last strong La Niña was from 1998 to 2001. Currently, the forecast is for above normal April-June temperature and an equal chance for above, below, or near normal precipitation. The significance of April-June precipitation will be discussed later in this issue. The grasslands in the Great Plains have evolved with constant change. Their change toward or away from what we consider "excellent" condition is predictable and is based on our grazing practices and climate influences. In order to improve drought-stricken pastures, you have to back off on the stocking rate to allow the plants to regain vigor and hope for above normal precipitation. Spring deferment is usually the best way to make this happen. Therefore, it is up to us to manage the healing process whether from drought, fire, or overgrazing. Climate change is happening, and we can't control it, but we can control how we graze the land.

For more information or other events the SOUTH DAKOTA GRASSLAND COALITION is involved with, please feel free to contact Sandy Smart or visit the website: http://sdgrass.org.

Society for Range Management 60th Annual Meeting in Reno, NV Highlights

By Sandy Smart

The Society for Range Management held its 60th annual meeting in Reno, NV February 10-15th. Fifteen students and 5 professors from SDSU attended. A heartfelt thanks from SDSU Range Club goes out to the South Dakota Section of SRM for providing $2800 to assist them in travel costs and $200 toward the section dinner. We had a good time at the SD section dinner at the Great Basin Brewing Company in which 30 people attended.

The Range club placed 10th out of 22 schools in the Undergraduate Range Management Exam and 5th out of 17 schools in the Plant ID exam.

Heather Richter, double major in Animal and Range Sciences, gave a presentation entitled, "Effects of Fall Wildfire and Summer Drought on Central South Dakota Grazinglands" from the wildfire that occurred on the Faulstich MIG site. Wendy Wells, Range Science major, gave a presentation entitled, "Fire Effects Monitoring in the Great Plains" from her work with the Bureau of Indian Affairs last summer.

Joe Reedy from Newell was the SD delegate to the High School Youth Forum and was elected President and will be participating at Louisville, KY next year.

Bill Slovek's ranch, near Philip, received first place for the Excellence in Range Management Award. This is the second year in a row in which a SD ranch has received this international award. Thanks to Haakon County Conservation District for nominating Bill and Tate Lantz for putting the poster together.

Prairie Coteau Habitat Partnership

By Sandy Smart

The Prairie Coteau Habitat Partnership (PCHP) began in 2001 with an informal meeting of agencies interested in promoting coordination and cooperation in prescribed fire management, wildland fire response, and technical training in fire management in northeast South Dakota.

Since that time, the team has gone through a process sponsored by the Nature Conservancy, the US Forest Service, and the Department of the Interior known as the *Fire Learning Network*. As a result of this effort, the PCHP has begun to explore innovative ways to promote wildlife habitat, sound grazing management, and economic return on private lands through the use of controlled burning as a management tool while taking into account the economic, social, and political forces that influence farming and ranching in this region.

This is a new effort, and we are just getting off the ground. It is our desire to inform interested landowners that we may be able to provide assistance in the use of controlled burning and grassland management in the near future. This may include assistance in burn planning, equipment and resource sharing, firebreak installation, conducting controlled burns, and burn impacts monitoring.

It is the goal of the PCHP to promote a greater appreciation of the value of native tallgrass prairie across the landscape by educating agencies and landowners about the processes that shaped the prairie ecosystems (fire and grazing). It is also our goal to work with agencies, landowners, and the public to return a more natural fire and grazing regime to

the region via promotion of economic incentives, conservation programs, volunteer fire department partnerships, and education to return fire to the landscape in a safe, efficient, ecological, and socially sensitive manner.

This idea was featured at last year's Annual Bus Tour when Pete Bauman showed us the purpose of prescribed burning at Lane Tekrony's near Clear Lake, SD.

If you are interested in prescribed burning, contact Pete Bauman 605-874-8517 or visit our website at http://www.nature.org/initiatives/fire/work/art18833.html.

Importance of Spring Precipitation

By Sandy Smart

Over the past five years I've been collecting various data sets from the Dakotas to look at what kind of weather data predicts forage production. As it turns out, a similar theme across these different regions shows up. You guessed it, spring precipitation. In some cases it is the sum of April-June precipitation and in other cases it is the sum of April and May or just one month, such as April, May or June. It was interesting to me that previous fall or winter precipitation was not a significant predictor of next year's forage production. This goes against the classic range science perspective. And you hear a lot of folks mentioning this fact. In my examination, these data just don't support it. It's my and some other scientists' opinion, that fall and winter precipitation is important for refilling dams and dugouts but is not as biologically-tied to forage production as is spring precipitation.

Recent examination of forage data collected from the ongoing MIG demonstration sites at Mark Sip's and Jim Faulstich's provides good evidence for the importance of spring precipitation. When I looked at Sip's data (2002-2006), April + May precipitation was the best predictor of forage production (Figure 1).

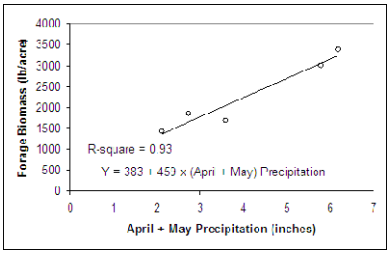

Figure 1. Forage biomass predicted by April + May precipitation at Mark Sip's (2002-2006)

At Jim Faulstich's, forage production was best predicted by April precipitation (Figure 2).

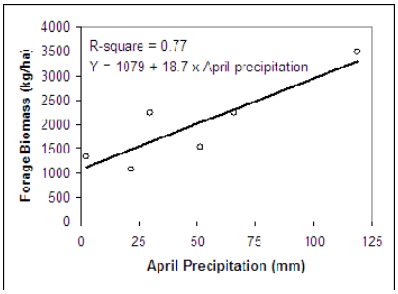

Figure 2. Forage biomass predicted by April's precipitation at Jim Faulstich's (2000-2005).

Ultimately, the reason for the large influence spring precipitation has on forage production is dependent on the kind of vegetation and when the bulk of the precipitation occurs. In the Great Plains, the majority of the forage biomass is composed of cool-season species. Warm-season grasses make up the majority of the forage in sandy sites of south central SD or in overgrazed shortgrass communities in western SD. Second, most of the precipitation occurs April-June with May or June having the highest amounts of precipitation.

Most cool-season grasses have finished their growth by late June because daily temperatures become too high for optimum photosynthesis.

Hopefully, these ideas will help you judge what kind of growing conditions you will have this year so that you can make appropriate stocking rate decisions.

SOUTH DAKOTA GRASSLAND COALITION

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Calendar of events:

Event	Date	Location	Contact Person	Phone No.
PCHP Meeting	Feb. 27	Watertown	Pete Bauman	874-8517
HRM Course	Feb. 26-27	Bison	Ellen Reddick	642-3272
HRM Course	March 7	Menno	John Keimig	387-4205
HRM Course	March 8	Armour	Nancy Barrick	724-2846

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