



**NORTH DAKOTA CHAPTER
SOIL AND WATER CONSERVATION SOCIETY**

RESOURCES *for the* **FUTURE**

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Chapter Officials:

Lena Bohm, **President**
Richard Webb, **President-Elect**
Jennifer Hegge, **Past President**
Kristin Wild, **Secretary-Treasurer**
Penny Doty, **Council Representative**
Michelle Jezeski, **Council Representative**

Committee Chairs:

Awards: Steve Schroeder, Bob Bird
Environmental Education: Lance Duey
Foundation Representative: Ron Luethe
Fundraising: Mike Collins
Historian: Fred Aziz
Professional Erosion and Sediment Control Liaison:
Myron Senechal
Membership: Russ Jordre
Newsletter: Jill Howard
Nominations: Todd Solem
Publicity: Kristin Wild
Scholarship: Mark Anderson
Webmaster: Jon Stika

Dates to Remember

- Manitoba North-Dakota Zero-Till Farmers Association 31st Annual Workshop – Feb 17-19 Brandon, MB
- Northern Plains SWCS Conference – Feb 18-20 Rapid City, SD
- USDA-ARS Research Results & Technology Conference – Feb 24 Mandan, ND

National SWCS Awards Presented

President Lena Bohm of the North Dakota Chapter of the Soil and Water Conservation Society is proud to announce that several North Dakota members and others received national awards at the SWCS national meeting held in Tucson, AZ in July, 2008. The awards recipients and their employers are: **Fellow Award** to Mr. Michael Collins, USDA-NRCS, Jamestown; **Conservation Research Award** to Dr. Mark Liebig, USDA-ARS, Mandan; **Commendation Award** to Mr. Robert Bird, USDA-ARS (retired), Bismarck; **Outstanding Service Award** to Dr. Stephan Schroeder, ND Public Service Commission, Bismarck; and **Honor Award** to Mr. Gabe Brown, farmer/rancher, Burleigh County.

In addition, a **Merit Award** will be presented to the North Dakota Living Snow Fence Initiative (a coalition consisting of several various government agencies) which will be presented to one of the representative agencies, the ND State Forest Service. The North Dakota Chapter also received a **National Achievement Award** and a **Professional Development Award** for activities held by the Chapter during 2007.

It is not too late to nominate someone or organization for a national award. The descriptions for all awards are located on the national webpage at the following address:

http://www.swcs.org/en/members_only/index.cfm?nodeID=11400&audienceID=1 . Please contact members of the award committee for further information.

NDSWCS and NDSCAND hold Annual Meeting Held October 9-10

Formulas for Clean Soil and Healthy Water

The North Dakota Chapter of the Soil and Water Conservation Society held its 2008 Annual Meeting October 9-10 in Dickinson, ND. The meeting was held as a joint meeting with the Professional Soil Classifiers Association of North Dakota (PSCAND); with technical presentations on Thursday covering such topics as Advanced Soil Biology, Web Soil Survey, Uses of IFSAR and LIDAR, Livestock Water Quality, Riparian Health Assessments, CNMP Planning, and North Dakota Discovery Farms.



Jon Stika and four assistants demonstrate what happens to the available energy in crop residue.

After the technical presentations, the Chapter held its annual business meeting and then gathered with PSCAND for a banquet and a very successful benefit auction.

Chapter awards were handed out during the banquet to the following individuals/groups: Jon Stika, Professional Award; Burleigh County SCD, Service Award; Hubbard Feeds Inc, Business Stewardship Award; and Richard Webb, Chapter Horizon Award.



Left: Jon Stika receiving the Professional Award from Bob Bird, Right: Glenn Bauer accepting the Service Award on behalf of the Burleigh County SCD.



Left: Steve Hepper accepting the Business Stewardship Award on behalf of Hubbard Feeds, Inc. Right: Richard Webb accepting the Chapter Horizon Award from Kristin Wild.

Friday's agenda included a tour of two sites. First stop was the Southwest North Dakota Soil Health Demonstration Plot located on the NDSU-Dickinson Research Extension Center's Manning Ranch; where the group viewed several plots of various cover crop trials as well as some field demonstrations of soil quality tests by Jon Stika. The second stop was the Stockman's Livestock Auction where Larry Schnell discussed proper composting techniques and demonstrated their compost turner.



Left: Todd Solem discusses cover crop cocktail at the Soil Health Demonstration Plot. Right: The tour group standing in cover crop cocktail; identifying species and discussing benefits of each.



Left: Runoff boxes used by Jon Stika to demonstrate runoff, infiltration, and aggregate stability. Right: Similar demonstration using funnels placed into small containers to show infiltration and crusting (made from two 20 ounce soda bottles). Notice in each demonstration one side is smooth and crusted and the other side has a crumbled appearance even though equal amounts of water were poured onto each. Which side infiltrates more water into the soil profile?



Left: Jon Stika discusses soil quality, soil biology, and soil water movement while running a series of low-tech but extremely effective demonstrations that anyone can do on their own farm or from their own office. Right: Larry Schnell from the Stockmen's Livestock Auction discusses their composting processes and general compost concepts with the group.



Left: Demonstration of measuring compost pile temperature. Right: Compost turner in action, note the 3 nozzles spraying water on the pile immediately prior to turning to maintain proper moisture.

The tour is on video and is available, see Richard Webb or Mike Collins for a copy.

Conservation, Sustaining our Future

Mark your calendars for “Conservation, Sustaining Our Future” technical conference sponsored by the Soil and Water Conservation Society (SWCS) Northern Plains Chapters. The conference is scheduled to be held February 18-20, 2009, at the Rushmore Plaza Holiday Inn, Rapid City, South Dakota.

Join natural resource enthusiasts from Montana, Wyoming, Colorado, Nebraska and North and South Dakota to hear the latest on soil quality, water quality trading credits, energy and conservation. The conference kicks off on February 18 with presentations on a wide variety of energy and conservation topics. The day will conclude with “Dig It,” a new Smithsonian Display presentation, given by Dr. Gary Peterson of Colorado State University. February 19 will focus on soil and water quality and what that means to landowners as well as professionals. Concurrent sessions will be held on February 20 with topics such as: AFO/CAFO rule update, Pollinators, Carbon Credit Trading and Using Visual Simulations for Communicating Conservation just to name a few. A total of 17.5 Continuing Education Units are available for Certified Crop Advisors and a total of 11 Continuing Education Units are available from the Society of Range Management.

Bring items from within your area to support the silent auction. Proceeds from the auction will assist Northern Plains Chapters fund activities within their own chapter.

Registration for SWCS members is \$90.00 early/\$100.00 late registration. Registration for non-SWCS members is \$100.00 early/\$110.00 late registration. Student Registration is \$25.00. Registration is due February 4, 2009. A full agenda and registration form is available by logging on to the North Dakota SWCS website at <http://www.ndswcs.org> or by contacting any SWCS member within the Northern Plains Region.

A block of rooms is available at the Rushmore Plaza Holiday Inn by calling 605/348-4000 and asking for the SWCS group. Room reservations must be made by January 18 to ensure the special group rate.

The conference will also include a poster session. The deadline to submit posters is January 15, 2009. A complete listing of poster topics is available on the North Dakota SWCS Chapter website at <http://www.ndswcs.org> or by contacting Mike Collins at 701/320-5459.

SWCS chapters across the United States foster the science and art of natural resource conservation. The work of chapters targets conservation of soil, water, and related natural resources on working land—the land used to produce food, fiber, and other services that improve the quality of life people experience in rural and urban communities. Chapters work to discover, develop, implement, and constantly improve ways to use land that sustains its productive capacity and enhances the environment at the same time.

For further information on the "Conservation – Sustaining our Future" conference logon to the North Dakota SWCS Chapter website at <http://www.ndswcs.org> or contact any SWCS chapter located within the Northern Plains.

Doing More With Less

The Manitoba North-Dakota Zero-Till Farmers Association will hold its 31st Annual Workshop and Trade Show from February 17-19, 2009. This annual event alternates between Canada and the United States, and this year will be held in Brandon, MB at the Victoria Inn. This year's workshop theme is "Doing More With Less", a topical theme in these changing economic times.

New to this year's workshop is a "Novice and Beginner" section, for those that are thinking of, or are early into the transition to zero-tillage. And back by popular demand will be the International Show and Tell, the Farmer-to-Farmer Rap sessions, and the Exclusive Extra Session, where farmers can visit with expert speakers in small groups to gain further knowledge in each expert's area of specialization.

Session Themes are "Whole Farm Economic Evaluation", "Soil Management and Fertility", "Weed and Disease Management", "New Crop Potential", and "What's Happening Underground". Keynote speakers include Roger Larson, President of the Canadian Fertilizer Institute from Ottawa, Ontario speaking on "Changes and Outlook in the Fertilizer Industry, and Dr. Rigas Karamanos of Westco Fertilizers from Calgary, Alberta speaking on "To Use or Not to Use – Maximizing Fertilizer Efficiency in Zero-Till". Opening and closing the Annual Workshop will be popular journalist, author and professional speaker Les Kletke, speaking on risk management with "Hold'em or Fold'em", and "What I have Learned". Other noted workshop speakers include Dr. Kris Nichols of the USDA Agriculture Research Station at Mandan, North Dakota presenting on "Microbial Engineering to Enhance Your Bottom Line", and Dr. Don Flaten from the University of Manitoba at Winnipeg presenting on "Are Your Phosphorus \$\$ staying on the Farm?"

The Manitoba North-Dakota Zero-Till Farmers Association Annual Workshop mandate is to advance key learnings by bringing in experts to their annual workshop, along with the leading industry exhibitors, while providing ample opportunity for farmers to share and learn from each other. For more information on registration see <http://www.mandakzerotill.org/> or contact Executive Secretary Alan Ness ph. 701-442-5457.

Research Results Conference February 24th

The 2009 Area 4 SCD Research Farm/USDA-ARS Research Results & Technology Conference will be held at the Seven Seas Inn & Conference Center in Mandan, ND on February 24th at 8:30 AM.

This year's program begins a multi-year focus to allow you to follow the annual results of major research studies in the three new CRIS (Current Research Information System) efforts at the Northern Great Plains Research Laboratory:

1. Integrated Agricultural Systems for the Northern Great Plains

- Develop and identify management principles common to integrated agricultural systems across production regions that reduce risks, improve competitiveness, and promote environmental stewardship.
- Determine the environmental and economic impacts of cover crop and cover crop mixtures in semiarid cropping systems.
- Develop dynamic cropping systems to help meet bio-energy production needs and increase economic returns while enhancing natural resource quality.

- Develop multiple enterprise systems that integrate crops and livestock to economically optimize the quality and quantity of agricultural products while maintaining or enhancing soil quality indicators.
- Identify the most appropriate methods for delivering new information and technologies to promote adoption by customers and stakeholders.

2. Soil Resource Evaluation of Management Systems to Enhance Agroecosystem Sustainability

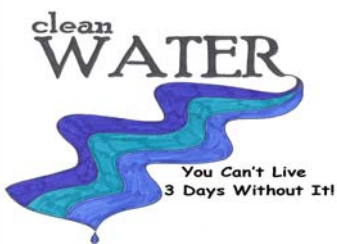
- Determine the effects of improved cropping systems management to enhance precipitation use and/or soil quality.
- Evaluate the ability of arbuscular mycorrhizal fungi to produce Glomalin and impact soil aggregation.
- Evaluate the effects of long-term grazing and dryland cropping management systems on greenhouse gas flux.

3. Rangeland and Livestock Resource Management

- Provide management guidelines to improve the conservation and enhancement of agroecosystem function and structure in grasslands of the northern Great Plains.
- Improve the viability of cattle production on the northern Great Plains by providing management strategies that increase the efficiency of forage utilization.
- Develop methods to alter the composition of beef so that it better meets the emerging market demand for healthier beef.

A Trade Show of new Ag technology will accompany the research reports. Lunch is provided by the Area 4 SCD Cooperative Research farm. The public is invited and encouraged to attend.

T-Shirts for Sale



SWCS Fundraising Chairperson Mike Collins was charged with coming up with ideas for the ND Chapter. With some brainstorming it has been decided to market t-shirt themes for the ND Chapter. With some creative artistic skills of Kristin Wild they have come up with a few examples. They are; “Soil, It’s What Makes Dinner”, “Clean Water, You Can’t Live Three Days Without It”, “Soil Profiles, Feeding the World One Profile at a Time” and “The SWCS Journal, the



Award Winning Conservation Journal , Stay Connected”. They will be going on sale soon for twenty dollars/shirt. If you would like to order, have any other clever ideas on t-shirt themes or any questions contact Mike Collins by emailing him at msdm@daktelwb.com. Please help promote and support the ND Chapter by buying one or more of these t-shirts.