Redwood

Soil and Water Conservation District

1241 E Bridge St Ste C
Redwood Falls, MN 56283
PHONE: (507) 637-2427
FAX: (507) 637-6002

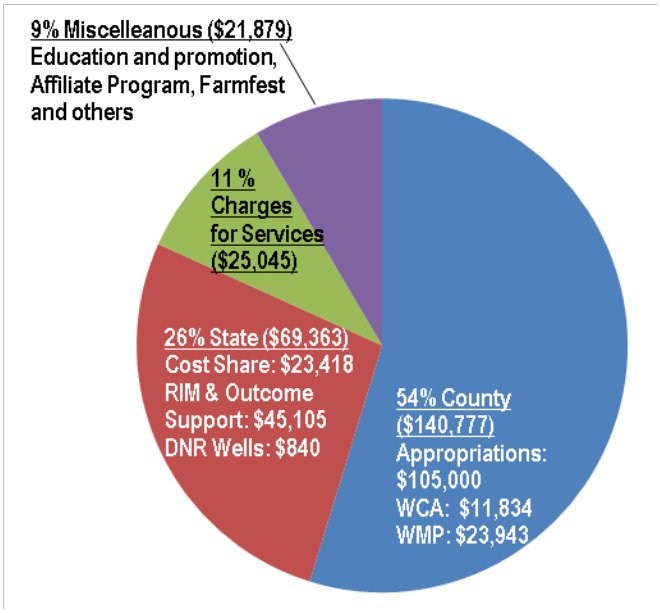
www.redwoodswcd.org

SWCD Board Meeting:
Second Thursday of each month 8:00 am except December - March @ 9:30 am

Top 5 Natural Resource Concerns

1. Restore water quality in the Minnesota, Redwood and Cottonwood Rivers.
2. Address impaired water by major watershed for priority pollutants: phosphorus, nitrogen, turbity and fecal coliform bacteria.
3. Control erosion and sedimentation adding residue management and installation of filter strips county wide.
4. Control gully and concentrated flows in the southwest portion of the county through installation of best management practices.
5. Reduce potential for flooding by wetland restorations and installation of small multi-purpose dams.

2008 Revenue



Recent Projects

Redwood SWCD, along with seven other SWCDs in the surrounding area, received a competitive grant through the Clean Water Legacy Act in 2007. These funds were used to work on the Dissolved Oxygen TMDL as well as other impairments that have been identified through completed diagnostic studies. This successful partnership between the SWCDs has helped apply conservation to the most vulnerable areas in the watersheds of the Redwood and Cottonwood rivers. The districts received a total of $315,000, which includes $165,000 in state dollars and $150,000 in EPA 319 dollars. The state dollars alone resulted in projects that reduced an estimated 1,626 tons of soil from entering the surface water bodies of the two watersheds. A total of $186,040 was spent in Redwood County from these two funding sources.

In 2008, the Redwood SWCD received a total of $600,000 in state grant dollars and 319 dollars. Many of these projects are in the planning stages; and they will reduce water erosion in the most vulnerable areas in the watershed.

We feel these partnerships will be the most successful in reducing sediments, nutrients, and other impairments that will help us reach the water quality goals of the Minnesota River.

The Renville, Redwood, Yellow Medicine, Chippewa and Lac qui Parle SWCDs have created a permanent easement program to protect granite rock outcrops. These sites house many of Minnesota's rarest native plant species, including Plains Prickle Pear cactus (pictured) and Prairie Bush Clover. The program protects these areas from mining, overgrazing or other future destruction, and it has already successfully established six easements protecting a total of 376.4 acres of granite rock outcrop in Redwood County alone. Funding for the program is through the Environment and Natural Resources Trust Fund, as recommended by the Legislative-Citizen Commission on Minnesota Resources (LCCMR).

Spring runoff erosion fixes

Pictured: Brian Pfarr, USDA NRCS technician (who is 6'4") stands in a gully that is more than 9 feet deep from one snow melt. The lower photo shows the repaired gully.

In the spring we can have warm temperatures early with snow cover still on the fields. Rapid snow melt can cause a large amount of surface runoff that creates a gully like the one pictured. The snow follows the furrows of the tillage practice from the fall and establishes a new path for the water to flow. It was calculated that this one-time event resulted in the deposit of 655 tons of sediments and nutrients that went directly into the Cottonwood River, which is just to the north of the field.

In order for the project to be completed successfully, a waterway needed to be installed on the adjoining landowner's property. With the cooperation of the two landowners, the gully was fixed with a waterway and water and sediment control basin. It is estimated that 175.7 tons of sediment and 240.1 pounds of phosphorus were reduced from entering the Cottonwood River.

Future Projects

Soil sampling for precision agriculture:

In the past our emphasis in agriculture has been placed toward each field, however with all the new technology at our fingertips it's time to start placing our emphasis on specific information per acre. This would precisely match fertilizer application to the needs of the crop. For example, in the past soil sampling has always been conducted per field and the same amount of nutrients is applied on the entire field, whether it is a 10 acre field or 160 acre field. New technology however allows us to grid sample the entire field and variably apply the nutrients to each specific location within the field. This is more effective than the previous nutrient management practices that follow the University of Minnesota recommendations simply due to the fact that is site specific.

The environmental benefits that can be achieved by variable application are limitless. With variable application, if nutrients currently exist, fewer nutrients need to be applied on site, causing less leaching, run-off and evaporation. Reduced nitrogen and phosphorus leaching will lead to the reduction of eutrophication causing our lakes, rivers, streams and ditches to become cleaner and healthier for wildlife, aquatic, and plant species. Not to mention saving most operators thousands of dollars in fertilizer costs.

This is one of the incentive practices that the Redwood-Cottonwood River Watershed Partnership has applied for in the 2010 Clean Water Fund.

Board Members

Mike Hewitt	Chair	(507) 859-2406	13027 Duncan Ave, Walnut Grove, MN 56180
Ralph Heiling	PR & I	(507) 249-3568	PO Box 194, Morgan, MN 56266
Thomas Morley	Secretary	(507) 641-3742	152 Baker Dr, Redwood Falls, MN 56283
Joseph Plaetz	Treasurer	(507) 747-2803	20177 250th St, Lucan, MN 56255
Donald Steffen	Vice Chair	(507) 648-3485	31382 120th St, Sanborn, MN 56083