

President's Message: A Salute to Rural Communities

Dear friends -

As most of you know, Floan-Sanders has been serving the small rural communities of Northwestern Minnesota for over 50 years. The small cities in this area of the state face unique issues and challenges and we find it very rewarding to help find solutions that are affordable and practical. We are proud of the work we have done and the relationships we have built over the years.

We are especially pleased when we see one of our towns prosper and grow. So it has been exciting for us to work on the plans for a new 18 lot development in the City of Warren. Due in large part to the recently completed Snake River Diversion, the development is a concrete example of what we've believed for some time: that small towns are a great place to live and raise a family and more and more people are coming to that conclusion as well.

This issue of Civil Talk was meant to highlight our work in some of our smaller communities and we had originally planned a story about the new Care Center in Warroad, funded almost entirely by a donation from Marvin Windows. Taking the best ideas from other facilities across the nation, the Care Center's design offered unique living options for older people, faced with differing needs.

Unfortunately, as you may know, that building was lost to a fire just a few weeks ago, after two years of construction work and a mere three months from opening. The devastating loss was offset by the community's immediate commitment to build again. We are awed by the spirit and optimism that we have seen in the people there and are confident that the complex will be a tremendous asset to the community when it is finally complete.

Best wishes to all our small towns,

- Greg Boppre, President

"I think a hero is an ordinary individual who finds strength to persevere and endure in spite of overwhelming obstacles."

- Christopher Reeve



"Few things are impossible to diligence and skill. Great works are performed not by strength but by perseverance."

- Samuel Johnson

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Phosphorus Management Plans: What You Need to Know

The latest threat to Minnesota's lakes and streams comes in the form of phosphorous - a naturally occurring substance, but one that comes from man-made sources as well. Phosphorous can come from point sources - mostly municipal and industrial wastewater discharges, and non-point sources - such as runoff from agricultural fields, feedlots, and urban areas.

Too much phosphorous in our wastewater causes the eutrophication of surface waters, which basically means too many nutrients in the water make some plants grow too fast, taking the oxygen out of the water and harming other plants and animals. The results of eutrophication are more commonly referred to as "algae bloom", an example of which is shown in the photo at the right.

The Minnesota Pollution Control Agency (MPCA) has been working to control phosphorous for many

years. The latest tool to help manage phosphorous in the environment is a Phosphorous Management Plan (PMP). PMPs are intended to help wastewater treatment facility operators understand the inputs of phosphorus to their systems and the treatment capabilities of their facilities. Ultimately, they are intended to help operators evaluate pollution prevention and WWTF optimization options to reduce the amount of phosphorous discharged into Minnesota waters.

A community's National Pollutant Discharge Elimination System (NPDES) permit for their wastewater treatment facility may require the preparation of a PMP. A few communities in northwestern Minnesota have recently received



Algae bloom in a Minnesota lake, caused by excessive phosphorous. (photo courtesy of MPCA website).

notification that they must prepare a PMP as a part of their permit renewal.

In general, a PMP should include all of the following information:

1. A facility description and flow schematic.
2. Your wastewater treatment

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Warren Sees First Private Development in 30 Years

As some rural communities face shrinking populations, Warren, Minnesota is planning for expansion with its first private development in over 30 years.

The Parkview 2nd Subdivision in the Southwest corner of town will boast 18 lots. Floan-Sanders' staff have been working on the plans, which include watermain, sanitary and storm sewer, asphalt paving, curb and gutter and a detention

pond for the subdivision. Construction is expected to begin in a few weeks and will include all utility work. The asphalt paving will be completed in the summer of 2009. The total project is expected to cost \$403,000.

City officials are planning a groundbreaking ceremony when construction begins to celebrate this important expansion.

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facility (WWTF) influent and effluent phosphorus concentration measurements.

3. An evaluation of your WWTF's phosphorus reduction potential.

4. Phosphorous reduction goals for your WWTF.

5. An evaluation of how to optimize your WWTF.

6. An evaluation of the phosphorus reduction potential of your users.

7. An implementation plan to meet phosphorus reduction goals.

Brad Bail, a Project Manager at Floan-Sanders, Inc., is currently working with the MPCA regarding the PMP requirements for St. Hilaire's permit renewal.

"Northwest Minnesota is already considered to have 'impaired' waters for various reasons," he explains, "so the MPCA is interested in having these PMPs prepared. This is a relatively new thing for our area. We are currently evaluating some of the newest products that have come out on the market to handle phosphorous to see what the best options are for our communities."

If you have questions or would like more information about PMPs, contact Bail at 218-773-5620. The MPCA website also contains a lot of helpful information about this topic and how to go about preparing a



The photo above shows one potential product, called a SolarBee, that may help treat phosphorous levels in wastewater ponds. (photo from SolarBee website.)

PMP for your facility. The address is <http://www.pca.state.mn.us/water/pmp.html> ◇

"We are currently evaluating some of the newest products that have come out on the market for handling phosphorous to see what the best options are for our communities."

- Brad Bail, Floan-Sanders

Engineering Question of the Day

Q: How much does a house weigh ?

A: Just a tad more than a rural two-lane bridge can hold, apparently.



(So would this be covered under house insurance, car insurance, or does it come under roadside assistance?)



Community Highlight: Fisher, MN

Nestled between the Red Lake River and US Highway 2 sits the city of Fisher, Minnesota, population 395. The city began as a railroad terminal village, originally called Shirt-tail Bend because

a shirt had once been tied to a pole to warn steamboats of the bend in the river. It was renamed Fisher's Landing in 1874 after William H. Fisher who managed several regional railroad companies. In 1882 the

name changed to just Fisher and it was incorporated as a village on February 9, 1881. *

The community has three churches, including St. Francis Catholic Church, the oldest Catholic Church in the Diocese and its own school district, which had a K-12 enrollment of almost 300 students in 2006. Floan-Sanders has been proud to serve as the City Engineer for Fisher since 1992. The City recently completed several large utility projects: a \$1 Million Water Distribution System Upgrade and a \$1 million Wastewater System Upgrade. The Water Distribution System project involved switching from the groundwater aquifer well supply to treated water in the Marshall Polk Rural Water System as well as replacing almost 3 miles of watermain that had originally been installed in the 1940s . The Wastewater System Upgrade included a new lift station and forcemain and the construction of a new primary pond.

* From *Minnesota Place Names* on the Minnesota Historical Society website



Warren . . . Continued from page 1

"We really have a unique location," explains C.T. Marhula, Warren City Administrator. "We're about 30 miles from Grand Forks, Crookston, and Thief River Falls so we're in a great location for couples who may work in two different communities. We offer small town life with quality schools and medical services, but also easy access to larger cities."

The recently completed Snake River Diversion project also made the new subdivision more feasible, as all of the property is now out of the 100 year floodplain.

According to developer Randy Engelstad, two of the lots are already spoken for and others are being looked at. If you are interested in purchasing a lot or learning more about the development, contact Engelstad at 218-745-5859. ◇

The highlighted area in the map at the right shows the location and layout of the Parkview Second Subdivision in Warren.

