Establishment of the BGMA

The Board of Directors of the Lewis and Clark NRD established the Bazile Groundwater Management Area (BGMA) in October of 2004 when more than 50% of irrigation wells monitored for water quality, contained over 10 ppm nitrates.

Establishment of the BGMA allowed for the implementation of rules and regulations to minimize the impact of agricultural practices on water quality and provide options to improve practices over time to turn around the trend of increasing nitrate levels. The recharge area for the groundwater source that supplies the city of Creighton with its primary drinking water source is located within the BGMA.

Average nitrate levels in groundwater in 2015 & 2016 indicated slight declines over previous years. However, 2017 marked an all time high average of 15.8 ppm for groundwater nitrate levels in the BGMA.

The Bazile Groundwater Management Area of the Lewis and Clark NRD

T29N, R5W	T29N, R4W	T29N R3W
		JET FUEL
Creighton Township	Cleveland Township	Columbia Township
7-1-1-1-1-	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	1 1 1 1 1 1
		The state
Lewis & Clark	NRD Lo	ower Eikhorn NRD

All of Creighton township (T29N, R5W), all of Cleveland township (T29N, R4W) except sections 25-27 and 34-36, and sections 6, 7, 18, and 19 of Columbia township (T29N, R3W).

Protect Groundwater

The Lewis & Clark NRD combined efforts with the Lower Elkhorn, Upper Elkhorn, and Lower Niobrara NRDs, to work with landowners to lower groundwater nitrate concentrations.

The project coordinator for the Bazile Area can be reached by calling the Lower Elkhorn NRD at 402-371-7313.

Additional cost share programs including up to 90% match on conservation programs are available through this partnership.

In 2014 the Natural Resources Conservation Service (NRCS) made much of the BGMA eligible to receive National Water Quality Incentive Program funding to producers for implementation of agricultural practices which contribute to improved water quality. Contact Knox County NRCS at 402-373-4914 ext. 3 for more information.



Phase III
Rules and Regulations
for the Bazile
Groundwater
Management Area
(BGMA) of the
Lewis and Clark NRD





Phase III Basic Rules & Regulations for the BGMA in the LCNRD

- All operators applying nitrogen containing fertilizer must certify attendance at a district approved education program once every four (4) years. Education programs are designed to provide information on Best Management Practices (BMP) and nitrogen application technology.
- Irrigation wells are tested biannually for nitrate content by the LCNRD. Results are provided to producers and landowners of the BGMA.
- 3. Annual soil sampling at **0-8**", **8-24**" and **24-36**" per UNL recommendations are required to legally apply nitrogen fertilizer and irrigate. **Cost share of 50%** is available through the Deep Soil Sampling Program.
- 4. Annual reports must be submitted by April 1 each year.
- 5. Fall and winter application of commercial nitrogen fertilizer is not allowed in the BGMA. Spring application must occur after March 15th. It is strongly recommended that nitrogen application be split throughout the growing season.
- Well permits are required prior to drilling new or replacement irrigation wells.



Cost Share Programs available to Landowners and Operators of the BGMA in the LCNRD

Deep Soil Sampling Program

The LCNRD offers 50% cost share for deep soil sampling in the BGMA to provide operators representative data to make appropriate nitrogen rate decisions. The program is offered on acres that will be planted to corn or another non-legume crop in the coming crop season.

Reimbursement is made upon receipt of sampling invoices, soil sampling results, and annual reports. Applications for cost share are accepted September 1 - April 1 each season.



Chemigation Program

New chemigation systems are eligible for a one-time, \$4.00/ac, payment. If you have land where chemigation for nitrogen application will be used for the first time on that property, the land is eligible. The program is intended to encourage landowners to implement chemigation as a method of nitrogen application. Chemigation allows for split application of nitrogen when the crop is actively growing which benefits the crop and groundwater resources.

Payment is made in the fall, after successful chemigation inspection, annual report submission, and receipt of crop consultant N recommendations. New applications are accepted year round and the renewal application deadline is June 1.

Cost Share Programs available to Landowners and Operators of the BGMA in the LCNRD

"SNIP" Program
Siphoning Nitrates with Irrigated Pasture

Siphoning Nitrates with Irrigated Pasture is a program designed to reduce nitratenitrogen concentrations in soil and water by utilizing nitrogen present in irrigation water on pasture. The program pays \$100/ac/year for a period of 5 years on a maximum of 160 acres. The program offers 65% cost share for grass seeding. Planned grazing components are also eligible to receive cost share funds. Acres must be converted from cropland to irrigated pasture to be eligible. Sign up is from August 1 to February 1 and work must be completed by May 1. Coordination with NRCS is required. Irrigation of the acres is required.

Siphoning Nitrates with Irrigated Hay is similar to the pasture program but features irrigated alfalfa or hay management. The program pays \$100/ac/year for the first and 5th year of enrollment, on a maximum of 160 acres. Seeding of the alfalfa or hay is not a cost shareable component of this program. Eligible ground is cropland converted to irrigated alfalfa or hay. Cooperators are asked to line up conversion seeding and coordinate management or harvesting. Irrigation of the acres is required.

Additional Programs

There are additional cost share funds available with 90% match on EQIP and other cost share programs through the BGMA. Contact Lisa Lauver, Bazile Groundwater Management Area Project Coordinator for more information, 402-371-7313.

The Natural Resources Conservation Service (NRCS) offers many conservation cost share programs, contact the Knox County NRCS at 402-373-4914 ext. 3.