



# Environment and Natural Resources Trust Fund (ENRTF)

## M.L. 2018 ENRTF Work Plan (Main Document)

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**Today's Date:** February 19, 2018

**Date of Next Status Update Report:** January 31, 2019

**Date of Work Plan Approval:** 06/05/2018

**Project Completion Date:** June 30, 2020

**Does this submission include an amendment request?** No

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**PROJECT TITLE:** Implement Pilot Credit-Trading System for Storm Water in Shell Rock River Watershed to Improve Water Quality

**Project Manager:** Courtney Christensen

**Organization:** Shell Rock River Watershed District

**College/Department/Division:**

**Mailing Address:** 214 West Main Street

**City/State/Zip Code:** Albert Lea, MN 56007

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**Web Address:** [www.shellrock.org](http://www.shellrock.org)

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**Location:** Project location is in the SE geographic region of Minnesota. Specifically limited to the Shell Rock River Watershed District located entirely within Freeborn County. The City of Albert Lea is also a project partner and is located within the Watershed.

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**Total Project Budget:** \$300,000

**Amount Spent:** \$0

**Balance:** \$300,000

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**Legal Citation:** M.L. 2018, Chp. 214, Art. 4, Sec. 02, Subd. 04k

**Appropriation Language:** \$300,000 the second year is from the trust fund to the commissioner of natural resources for an agreement with the Shell Rock River Watershed District to develop and implement a pilot water-quality credit-trading program for storm water that provides voluntary and cost-effective options to reduce pollution on a watershed scale.

## **I. PROJECT STATEMENT:**

The Shell Rock River Watershed District (SRRWD) Stormwater Quality Trading Pilot Program (the “Program”) will develop and implement the state’s first model framework for stormwater credit trading. Water quality credit trading is a flexible, cost- effective compliance plan that can accelerate implementation and water quality improvements.

The Program is a collaborative effort between the SRRWD, the City of Albert Lea, and the Minnesota Pollution Control Agency (MPCA). Stormwater credit trading begins when an upstream landowner, or discharger, reduces pollution or nutrients below levels that are required by law. Those nutrient reductions are then verified, and measured by third party scientists and translated into “credits” that are sold to a credit bank. Downstream towns or cities, in this case the City of Albert Lea, would then purchase those credits instead of spending multi-million dollars in stormwater system retrofits. The Program will establish a transferrable approach that could be used across Minnesota for sediment and nutrient credit trading for stormwater.

While the MPCA has done nutrient trading in a single permit/single point source setting, it has not been translated into the multi-point stormwater context. This program will deploy a multi-disciplinary working group to develop the heavy science and infrastructure necessary for success. The Shell Rock River Watershed District has conducted 15 years of projects and research that will be used to develop and test the necessary science and ratios for project success.

There are 3 overall goals of the pilot Program:

1. Create a transferable trading framework that incorporates eligibility and transaction protocols when working with a credit trading program.
2. Test numerous factors involved in water quality trading to verify and adjust the Program to provide equal or greater reductions in pollution than conventional methods.
3. Provide voluntary opportunities for accelerated implementation for both point and non-point loading reductions.

This program builds on an existing system of natural resource data and information. It would also produce a foundational document for water quality trading in Minnesota. In addition, the watershed district would improve the water resources of the communities within the watershed by reducing pollution and nutrients. Finally, this Program uses innovative, scientific methods to protect and restore out water though a well-established coalition of the city, watershed district, and landowners.

## **II. OVERALL PROJECT STATUS UPDATES:**

**Project Status as of January 31, 2019**

**Project Status as of June 30, 2019**

**Project Status as of January 31, 2020**

**Project Status as of June 30, 2020**

## **III. PROJECT ACTIVITIES AND OUTCOMES:**

**ACTIVITY 1:** Identify and Establish Baselines

**Description:** To become a seller, an upstream discharger/landowner must control its pollution discharge beyond its current obligations. The Program would identify credit generation, or seller, opportunities and baselines from landowners, in-lake and stream management programs and other opportunities for best management practices by inventorying existing drainage infrastructure.

The primary transferable outcome of this step will be to create a voluntary working template that can be used on a case by case basis in other Minnesota communities.

**ENRTF BUDGET: \$74,000**

| <b>Outcome</b>  | <b>Completion Date</b> |
|---|------------------------|
| 1. Identify and Catalogue Municipal Pollutant Loading     | March 1, 2019          |
| 2. Establish Eligibility Conditions for Credit Generators | July 1, 2019           |
| 3. Establish Baseline Conditions for Credit Buyers        | August 1, 2019         |

**Activity 1 Status as of January 31, 2019**

**Activity 1 Status as of June 30, 2019**

**Activity 1 Status as of January 31, 2020**

**Activity 1 Status as of June 30, 2020**

**ACTIVITY 2: Establish Trade Ratios and Trade Mechanics**

**Description:** The primary outcome of this step will be to select appropriate scientific models to estimate load reductions from Best Management Practices (BMP's). A trading ratio is the mechanism to place value on pollution reductions. For non-point sources, measuring pollution reduction for BMP's is site-specific. The Program will focus primarily on phosphorus reduction, although such a program can provide many ancillary benefits by reducing other pollutant parameters.

**ENRTF BUDGET: \$160,000**

| <b>Outcome</b>               | <b>Completion Date</b> |
|------------------------------|------------------------|
| 1. Develop Trade Ratios      | January 1, 2020        |
| 2. Establish Trade Mechanics | February 1, 2020       |

**Activity 2 Status as of January 31, 2019**

**Activity 2 Status as of June 30, 2019**

**Activity 2 Status as of January 31, 2020**

**Activity 2 Status as of June 30, 2020**

**ACTIVITY 3: Stakeholder Review and Final Report**

**Description:** Identified stakeholders will be included to perform review and input on the Program. A final report will be prepared for possible state-wide implementation.

**ENRTF BUDGET: \$66,000**

| <b>Outcome</b>        | <b>Completion Date</b> |
|-----------------------|------------------------|
| 1. Stakeholder Review | May 1, 2020            |
| 2. Final Report       | June 30, 2020          |

**Activity 3 Status as of January 31, 2019**

**Activity 3 Status as of June 30, 2019**

**Activity 3 Status as of January 31, 2020**

**Activity 3 Status as of June 30, 2020**

**IV. DISSEMINATION:**

**Description:** Project plans for dissemination, presentation, documentation, or sharing of data results will be found on the Shell Rock River Watershed District website page. The web page is located at: [www.shellrock.org](http://www.shellrock.org) and will be listed under the projects tab located on the left hand side of the webpage. Social media including Facebook and Twitter will sometimes contain reference to the Program. Links to those sites can be found on the SRRWD website page.

Project personnel will also be prepared to share the final report with the MPCA, stakeholders, interested organizations and key policy makers.

**First Update January 31, 2019**

**Second Update June 30, 2019**

**Third Update January 31, 2020**

**Final Update June 30, 2020**

**V. PROJECT BUDGET SUMMARY:**

**A. Preliminary ENRTF Budget Overview:** See attached budget spreadsheet

**Explanation of Capital Expenditures Greater Than \$5,000:** N/A

**Explanation of Use of Classified Staff:** N/A

**Total Number of Full-time Equivalents (FTE) Directly Funded with this ENRTF Appropriation:**

- Courtney Christensen, Project Manager: \$26,500 (67% wage, 33% benefits) 0.17 FTE per year for 2 years

**Total Number of Full-time Equivalents (FTE) Estimated to Be Funded through Contracts with this ENRTF Appropriation:**

- Trading Consultant(s): 0.48 FTE over 2 years
- Engineering/Ground Support Consultant(s): 0.29 FTE over 2 years
- Agency/Stakeholder Outreach: 0.08 FTE over 2 years

**B. Other Funds:**

| SOURCE OF AND USE OF OTHER FUNDS   | Amount Proposed | Amount Spent | Status and Timeframe  |
|--|-----------------|--------------|-----------------------|
| <b>Other Non-State \$ To Be Applied To Project During Project Period:</b>  | \$ N/A          | \$           |                       |
| <b>Other State \$ To Be Applied To Project During Project Period:</b>  | \$ N/A          | \$           |                       |
| <b>In-kind Services To Be Applied To Project During Project Period:</b><br>The Minnesota Pollution Control Agency has secured funding for staff that will provide the in-kind services for Mike Trogan and Marco Graziani. | \$11,300        | \$           | Secured, Over 2 years |
| <b>Past and Current ENRTF Appropriation:</b>   | \$ N/A          | \$           |                       |
| <b>Other Funding History:</b>  | \$ N/A          | \$           |                       |

**VI. PROJECT PARTNERS:**

**A. Partners receiving ENRTF funding**

| Name | Title | Affiliation | Role |
|------|-------|-------------|------|
| N/A  |       |             |      |

**B. Partners NOT receiving ENRTF funding**

| Name                | Title                                   | Affiliation                        | Role                                    |
|---------------------|---|------------------------------------|---|
| Mike Trogan         | PhD. Hydrologist                        | Minnesota Pollution Control Agency | Stormwater Municipal Division           |
| Bruce Henningsgaard | Principle Engineer                      | Minnesota Pollution Control Agency | Water Assessment/Environmental Outcomes |
| Marco Graziani      | TMDL Coordinator                        | Minnesota Pollution Control Agency | Wastewater Municipal Division           |
| Steven Jahnke       | Director of Public Works, City Engineer | City of Albert Lea                 | Storm Water Division                    |

**VII. LONG-TERM- IMPLEMENTATION AND FUNDING:**

The long-term impact of this pilot Program is to develop and implement a model stormwater quality credit trading framework to provide voluntary, cost effective way to reduce pollution in watersheds across the state of Minnesota. This is a self-contained project and will take up to 2 years to complete.

**VIII. REPORTING REQUIREMENTS:**

- **The project is for 2 years, will begin on 7/1/2018, and end on June 30, 2020.**
- **Periodic project status update reports will be submitted January 31 and June 30 of each year.**
- **A final report and associated products will be submitted between June 30 and August 15, 2020.**

**IX. SEE ADDITIONAL WORK PLAN COMPONENTS:**

- A. Budget Spreadsheet - Attached**
- B. Visual Component or Map - Attached**
- C. Parcel List Spreadsheet N/A**
- D. Acquisition, Easements, and Restoration Requirements N/A**
- E. Research Addendum N/A**

Attachment A:  
 Environment and Natural Resources Trust Fund  
 M.L. 2018 Budget Spreadsheet

Project Title: Implement Pilot Credit-Trading System for Storm Water in Shell Rock River Watershed to Improve Water Quality

Legal Citation: M.L. 2018, Chp. 214, Art. 4, Sec. 02, Subd. 04k

Project Manager: Courtney Christensen

Organization: Shell Rock River Watershed District

College/Department/Division: N/A

M.L. 2018 ENRTF Appropriation: \$300,000

Project Length and Completion Date: 2 years; June 30, 2020

Date of Report: 2/19/2018



| ENVIRONMENT AND NATURAL RESOURCES TRUST FUND BUDGET   | Budget           | Amount Spent | Balance          |
|---|------------------|--------------|------------------|
| <b>BUDGET ITEM</b>  |                  |              |                  |
| <b>Personnel (Wages and Benefits)</b>   |                  |              |                  |
| <i>Courtney Christensen, Project Manager: \$26,500 (67% wage, 33% benefits) 0.17 FTE per year for 2 years</i>   | \$26,500         | \$0          | \$26,500         |
| <b>Professional/Technical/Service Contracts</b>   |                  |              |                  |
| <i>Credit Trading Consultant(s). RFP's will be distributed and vendor contracts will be awarded on a competitive and performance basis.</i>             | \$155,000        | \$0          | \$155,000        |
| <i>Engineering/Ground Support Consultant(s). RFP's will be distributed and vendor contracts will be awarded on a competitive and performance basis.</i> | \$92,000         | \$0          | \$92,000         |
| <i>Agency/Stakeholder Outreach. RFP's will be distributed and vendor contracts will be awarded on a competitive and performance basis.</i>              | \$22,000         | \$0          | \$22,000         |
| <i>Collection of City of Albert Lea Storm Water Inventory</i>   | \$4,500          | \$0          | \$4,500          |
| <b>COLUMN TOTAL</b>   | <b>\$300,000</b> | <b>\$0</b>   | <b>\$300,000</b> |