# 2010 Project Abstract

For the Period Ending June 30, 2014

PROJECT TITLE: Scientific and Natural Areas and Native Prairie Restoration,

**Enhancement and Acquisition** 

**PROJECT MANAGER:** Margaret (Peggy) Booth

**AFFILIATION:** DNR Scientific & Natural Area Program

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**FUNDING SOURCE:** Environment and Natural Resources Trust Fund)

LEGAL CITATION: M.L. 2010, Chp. 362, Sec. 2, Subd. 4b & M.L. 2013, Chp. 52, Sec. 2,

**Subd. 17** 

**APPROPRIATION AMOUNT: \$1,750,000** 

#### Overall Project Outcome and Results

Permanent protection of biodiversity significance sites was achieved on 235 acres: 162 acres were acquired in fee as Scientific and Natural Areas (SNAs) and 73 acres were protected through Native Prairie Bank (NPB) conservation easements. This appropriation helped create the new Mille Lakes Moraine SNA and Badoura Jack Pine Forest SNA. Additions were acquired to Blanket Flower Prairie and St. Wendel Tamarack Bog SNAs. Two NPB easements were acquired in the Correll Working Lands area. Seventeen NPB easement baseline property reports were completed.

Restoration and enhancement accomplishments on over 4000 acres included: native seed collection from 186 acres (16 sites) and seeding of 68 acres (11 sites); invasives species control on 1175 acres (about 73 sites), invasive species inventory on 2646 acres (36 sites), and 4 invasives boot brush kiosks installed (3 sites); prescribed burning of 3733 acres (54 sites); new interpretive signs for 5 SNAs and installation of other signs (31 sites); 4.3 miles of fence removed, repaired or built; and 6 sites cleaned up. About 84 of these projects involved CCM. Twenty-six adaptive management plans were completed by primarily by contractors (covering 5603 acres) all or in part with this appropriation. Ecological prairie monitoring has been conducted on pollinators at 14 SNAs, snakes at 1 SNA, birds at 2 SNAs, and prairie vegetation at 6 SNA and 6 NPB sites. Improvements to the Adaptive Management Spatial Database were implemented.

Prairie stewardship work was comprised of two prairie landowner workshops, three prairie practitioner forums, presentations at an environmental fair, and direct technical assistance to 75 native prairie landowners. Contractors prepared 36 Prairie Stewardship Plans and staff have completed 2 Prairie Stewardship Plans. All 500 Prairie Tax Exemption sites were reviewed, reenrollment letters were sent to 250 PTE landowners, and 30 applications were processed.

# Environment and Natural Resources Trust Fund (ENRTF) 2010 Work Program Final Report

Date of Report: August 15, 2014

**Final Report** 

**Date of Work Program Approval:** June 9, 2010 **Project Completion Date:** June 30, 2014

I. PROJECT TITLE: Scientific and Natural Areas and Native Prairie Restoration,

**Enhancement and Acquisition** 

**Project Manager**: Margaret (Peggy) Booth

**Affiliation:** DNR Scientific & Natural Area Program

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Location: statewide, see attached map

Total ENRTF Project Budget: ENRTF Appropriation \$1,750,000

Minus Amount Spent: \$ 1,749,722 Equal Balance: \$ 268

Legal Citation: M.L. 2010, Chp. 362, Sec. 2, Subd. 4b & M.L. 2013, Chp. 52, Sec. 2,

**Subd. 17** 

#### **Appropriation Language:**

\$1,750,000 is from the trust fund to the commissioner of natural resources to acquire lands with high quality native plant communities and rare features to be established as scientific and natural areas as provided in Minnesota Statutes, section 86A.05, subdivision 5, restore parts of scientific and natural areas, and provide assistance and incentives for native prairie landowners. A list of proposed acquisitions must be provided as part of the required work program. Land acquired with this appropriation must be sufficiently improved to meet at least minimum management standards as determined by the commissioner of natural resources. This appropriation is available until June 30, 2014, by which time the project must be completed and final products delivered.

The availability of the appropriations for the following projects are extended to June 30, 2014: (4) Laws 2010, chapter 362, section 2, subdivision 4, paragraph (b), Scientific and Natural Areas and Native Prairie Restoration, Enhancement, and Acquisition;"

#### **II. FINAL PROJECT SUMMARY AND RESULTS:**

Permanent protection of biodiversity significance sites was achieved on 235 acres: 162 acres were acquired in fee as Scientific and Natural Areas (SNAs) and 73 acres were protected through Native Prairie Bank (NPB) conservation easements. This appropriation helped create the new Mille Lakes Moraine SNA and Badoura Jack Pine Forest SNA. Additions were acquired to Blanket Flower Prairie and St. Wendel Tamarack Bog SNAs. Two NPB easements were acquired in the Correll Working Lands area. Seventeen NPB easement baseline property reports were completed.

Restoration and enhancement accomplishments on over 4000 acres included: native seed collection from 186 acres (16 sites) and seeding of 68 acres (11 sites); invasives species control on 1175 acres (about 73 sites), invasive species inventory on 2646 acres (36 sites), and 4 invasives boot brush kiosks installed (3 sites); prescribed burning of 3733 acres (54 sites); new interpretive signs for 5 SNAs and installation of other signs (31 sites); 4.3 miles of fence removed, repaired or built; and 6 sites cleaned up. About 84 of these projects involved CCM. Twenty-six adaptive management plans were completed by primarily by contractors (covering 5603 acres) all or in part with this appropriation. Ecological prairie monitoring has been conducted on pollinators at 14 SNAs, snakes at 1 SNA, birds at 2 SNAs, and prairie vegetation at 6 SNA and 6 NPB sites. Improvements to the Adaptive Management Spatial Database were implemented.

Prairie stewardship work was comprised of two prairie landowner workshops, three prairie practitioner forums, presentations at an environmental fair, and direct technical assistance to 75 native prairie landowners. Contractors prepared 36 Prairie Stewardship Plans and staff have completed 2 Prairie Stewardship Plans. All 500 Prairie Tax Exemption sites were reviewed, re-enrollment letters were sent to 250 PTE landowners, and 30 applications were processed.

#### III. PROGRESS SUMMARY AS OF FEBRUARY 28, 2014

Acquisitions of additions to two SNAs closed in fall 2011 – a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation). Acquisition of a new 319-acre new Mille Lacs Moraine SNA closed in June 2012 (partly funding with this appropriation.) Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands area of Big Stone County totaling 72.6 acres closed in March 2011 (exceeding the target acres and completing this activity) with their landowners signing the completed baseline property reports. Seventeen Native Prairie Bank baseline property reports were completed.

Restoration and enhancement activities to date include: native seed collection from 186 acres (16 sites) and seeding of 60 acres (11 sites); invasives species control on 1175 acres (about 73 sites), invasive species inventory on 2646 acres (36 sites), and 4 invasives control boot brush kiosks installed (3 sites); installation of 60 miles of burn breaks (59 sites) and prescribed burning of 3733 acres (54 sites); design of new interpretive signs for 5 SNAs (and installation of most of these) and installation of other signs (31 sites); about 4.3 miles of fence removed, repaired or built; and 6 sites cleaned up. About 84 of these projects involved CCM. Twenty-six adaptive management plans were completed by primarily by contractors (covering 5603 acres), paid all or in part with this appropriation). Ecological prairie monitoring has been conducted on pollinators at 4

SNAs, snakes at 1 SNA, birds at 1 SNAs, and prairie vegetation at 5 sites. Improvements to the Adaptive Management Spatial Database are continuing to be implemented.

[Same Summary as October 2012] Two landowner workshops was held, three practitioner forums were conducted, presentations given at a environmental fair, and direct technical assistance has been provided to 75 native prairie landowners. Contractors prepared 36 Prairie Stewardship Plans and staff have completed 2 Prairie Stewardship Plans. All 500 Prairie Tax Exemption (PTE) have been reviewed and screened, re-enrollment letters were sent to 250 PTE landowners, and 30 applications were processed with this appropriation.

# PROGRESS SUMMARY AS OF AUGUST 23, 2013:

Acquisitions of additions to two SNAs closed in fall 2011 – a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation). Acquisition of a new 319-acre new Mille Lacs Moraine SNA closed in June 2012 (partly funding with this appropriation.) Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands area of Big Stone County totaling 72.6 acres closed in March 2011 (exceeding the target acres and completing this activity) with their landowners signing the completed baseline property reports. Seventeen Native Prairie Bank baseline property reports were completed.

Restoration and enhancement activities to date include: native seed collection from 186 acres (16 sites) and seeding of 56 acres (10 sites); invasives species control on 1166 acres (about 73 sites), invasive species inventory on 2646 acres (36 sites), and 4 invasives control boot brush kiosks installed (3 sites); installation of over 58 miles of burn breaks (59 sites) and prescribed burning of 3721 acres (53 sites); design of new interpretive signs for 5 SNAs (and installation of most of these) and installation of other signs (26 sites); about 4.3 miles of fence removed, repaired or built; and 6 sites cleaned up. About 84 of these projects involved CCM. Three adaptive management plans were completed by contractors (covering over 1400 acres) with another 26 additional management plans in progress (partially funded with this appropriation; ecological prairie monitoring is underway this summer on pollinators, snakes, birds and vegetation; improvements to the Adaptive Management Spatial Database are continuing to be implemented.

[Same Summary as October 2012] Two landowner workshops was held, three practitioner forums were conducted, presentations given at a environmental fair, and direct technical assistance has been provided to 75 native prairie landowners. Contractors prepared 36 Prairie Stewardship Plans and staff have completed 2 Prairie Stewardship Plans. All 500 Prairie Tax Exemption (PTE) have been reviewed and screened, re-enrollment letters were sent to 250 PTE landowners, and 30 applications were processed with this appropriation.

Amendment Approved: May 9, 2013 extending the project until June 2013.

#### PROGRESS SUMMARY AS OF MARCH 14, 2013:

Acquisitions of additions to two SNAs closed in fall 2011 – a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation). Acquisition of a new 319-acre new Mille Lacs Moraine SNA closed in June 2012 (partly funding with this appropriation.) Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands area of Big Stone County totaling 72.6 acres closed in March 2011 (exceeding the target acres and completing this activity) with their landowners signing the completed baseline property reports. Seventeen Native Prairie Bank baseline property reports were completed.

Restoration and enhancement activities to date include: native seed collection from 186 acres (16 sites) and seeding of 56 acres (10 sites); invasives species control on 1128 acres (about 73 sites), invasive species inventory on 2646 acres (36 sites), and 4 invasives control boot brush kiosks installed (3 sites); installation of over 58 miles of burn breaks (59 sites) and prescribed burning of 3719 acres (53 sites); installation of signs (26 sites); about 4.3 miles of fence removed, repaired or built; and 6 sites cleaned up. About 84 of these projects involved CCM. Three adaptive management plans were completed by contractors (covering over 1400 acres) with another 26 additional management plans in progress (partially funded with this appropriation; ecological monitoring was completed on twelve prairie sites; improvements to the Adaptive Management Spatial Database are continuing to be implemented.

[Same Summary as October 2012] Two landowner workshops was held, three practitioner forums were conducted, presentations given at a environmental fair, and direct technical assistance has been provided to 75 native prairie landowners. Contractors prepared 36 Prairie Stewardship Plans and staff have completed 2 Prairie Stewardship Plans. All 500 Prairie Tax Exemption (PTE) have been reviewed and screened, re-enrollment letters were sent to 250 PTE landowners, and 30 applications were processed with this appropriation.

#### PROGRESS SUMMARY AS OF OCTOBER 31, 2012:

Acquisitions of additions to two SNAs closed in fall 2011 – a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation). Acquisition of a new 319-acre new Mille Lacs Moraine SNA closed in June 2012 (partly funding with this appropriation.) Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands area of Big Stone County totaling 72.6 acres closed in March 2011 (exceeding the target acres and completing this activity) with their landowners signing the completed baseline property reports. Seventeen Native Prairie Bank baseline property reports were completed.

Restoration and enhancement activities to date include: native seed collection from 124 acres (15 sites) and seeding of 47 acres (10 sites); invasives species control on 1127 acres (about 70 sites), invasive species inventory on 2646 acres (36 sites), and 4 invasives control boot brush kiosks installed (3 sites); installation of over 57 miles of burn breaks (60 sites) and prescribed burning of 4,047 acres (57 sites); installation of signs (26 sites); about 4.3 miles of fence removed, repaired or built; and 6 sites cleaned up. About 84 of these projects involved CCM. Three adaptive management plans were

completed by contractors (covering over 1400 acres); ecological monitoring was completed on twelve prairie sites; improvements to the Adaptive Management Spatial Database were implemented.

Two landowner workshops was held, three practitioner forums were conducted, presentations given at a environmental fair, and direct technical assistance has been provided to 75 native prairie landowners. Contractors prepared 36 Prairie Stewardship Plans and staff have completed 2 Prairie Stewardship Plans. All 500 Prairie Tax Exemption (PTE) have been reviewed and screened, re-enrollment letters were sent to 250 PTE landowners, and 30 applications were processed with this appropriation.

# PROGRESS SUMMARY AS OF APRIL 27, 2012:

Acquisitions of additions to two SNAs closed in fall 2011 – a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation). Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands area of Big Stone County totaling 72.6 acres closed in March 2011 (exceeding the target acres and completing this activity) with their landowners signing the completed baseline property reports. Acquisition is underway of a 52-acre site that is proposed as the new Rushford Bluffs SNA, a portion of the 319-acre new Mille Lacs Moraine SNA, and an access easement to Englund Ecotone SNA.

Restoration and enhancement activities to date include: native seed collection from 83 acres (10 sites) and seeding of 30 acres (6 sites); invasives species control on 719 acres (about 70 sites) and invasive species inventory on over 1500 acres (13 sites); installation of over 29 miles of burn breaks (49 sites) and prescribed burning of 2,630 acres (33 sites); installation of signs (25 sites); about 4 miles of fence removed, repaired or built; and 7 sites cleaned up. About 67 of these projects involved CCM. Three adaptive management plans were completed by contractors (covering over 1400 acres); ecological monitoring was completed on eight prairie sites; improvements to the the Adaptive Management Spatial Database were implemented.

One landowner workshop was held, three practitioner forums were conducted, presentations given at a environmental fair, and direct technical assistance has been provided to 40 native prairie landowners. Contractors are preparing 35 Prairie Stewardship Plans and 2 NPB baseline property reports and staff have completed 1 Prairie Stewardship Plan. Twenty-six Prairie Tax Exemption (PTE) landowners have re-enrolled to-date out of 55 letters sent requesting re-enrollment and ~250 PTE tracts screened; another 50 landowners have just received letters.

# PROGRESS SUMMARY AS OF DECEMBER 1, 2011:

Acquisitions of additions to two SNAs closed in fall 2011 – a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation). Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands area of Big Stone County totaling 72.6 acres closed in March 2011 (exceeding the target acres and completing this activity) with their landowners signing the completed baseline property reports. Acquisition is underway, in part through this appropriation, of a 52-acre site that is

proposed as the new Rushford Bluffs SNA and up to 620 acres to be added to Englund Ecotone SNA.

Restoration and enhancement activities to date include: native seed collection from 83 acres (10 sites) and seeding of 19 acres (5 sites); invasives species control on 1702 acres (40 sites) and invasive species inventory on over 1500 acres (13 sites); installation of over 29 miles of burn breaks (49 sites) and prescribed burning of 2,523 acres (30 sites); installation of signs (21 sites); about 4 miles of fence removed, repaired or built; and 4 sites cleaned up. About 67 of these projects involved CCM. Three adaptive management plans were completed by contractors (covering over 1400 acres); ecological monitoring was completed on eight prairie sites; improvements to the the Adaptive Management Spatial Database were implemented.

One landowner workshop was held, presentations given at a environmental fair, and direct technical assistance has been provided to 37 native prairie landowners. Contractors are preparing 35 Prairie Stewardship Plans and 5 NPB baseline property reports and staff have completed 1 Prairie Stewardship Plan. Thirteen Prairie Tax Exemption (PTE) landowners have re-enrolled to-date out of 55 letters sent requesting re-enrollment and ~250 PTE tracts screened.

# PROGRESS SUMMARY AS OF MAY 5, 2011:

Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands area of Big Stone County totaling 72.6 acres closed in March 2011 (exceeding the target acres and completing this activity) with their landowners signing the completed baseline property reports. Acquisitions of additions to three SNAs are underway, including an offer made on a 160-acre addition to Blanket Flower SNA in Clay County.

Restoration and enhancement activities to date include: native seed collection from 20 acres (3 sites) and seeding of 4.5 acres (1 site); invasives species control on 177 acres (28 sites); installation of over 23 miles of burn breaks (36 sites) and 2 fall prescribed burns; installation of signs (6 sites); about 5 miles of fence removed, repaired or built; and 3 sites cleaned up. Work is underway on preparing a set of adaptive management plans (contractors are working on 3 plans (covering over 1000 acres) and implementing and improving the Adaptive Management Spatial Database.

One landowner workshop was held and direct technical assistance has been provided to 21 native prairie landowners. Bids/proposals are being received from contractors to prepare Prairie Stewardship Plans &/or baseline property reports. Prairie Tax Exemption work has been initiated.

# PROGRESS SUMMARY AS OF DECEMBER 20, 2010:

Acquisition of a 68.89 addition to the Savage Fen SNA closed in November 2010 including a small amount of funding from this appropriation (pro-rated at 0.9 acres). Additions to Hastings Sand Coulee and Seminary Fen SNA are in the acquisition process. Two Native Prairie Bank conservation easement acquisitions in the Correll Working Lands area of Big Stone County (previously referenced as the Big Stone Moraine Prairie in Table 1) totaling 71 acres are underway.

Restoration and enhancement activities to date include: native seed collection from 15 acres (2 sites); invasives species control on 70 acres (16 sites); over 10 miles of burn breaks installed; installation of signs (3 sites), over 3 miles of fence removed, and 1 site cleaned up. Work is underway on preparing a set of adaptive management plans and implementing and improving the Adaptive Management Spatial Database.

Technical assistance has been provided to 13 native prairie landowners. Outreach, stewardship plan, and Prairie Tax Exemption work has been initiated.

#### IV. OUTLINE OF PROJECT RESULTS:

# **RESULT/ACTIVITY 1: Protection of Sites of Biodiversity Significance**

**Description:** Sites are identified by Minnesota County Biological Survey (MCBS) as priorities for protection because they contain rare and endangered plant and animal species, undisturbed plant communities, and key habitats for Species of Greatest Conservation Need (SGCN) identified in the State Wildlife Action Plan (SWAP). In addition, to be eligible for Scientific and Natural Area (SNA) acquisition and designation, an Ecological Evaluation for each geographic area must be approved by the Commissioner's Advisory Committee. This work directly implements Habitat Recommendation 1 (Protect priority land habitats) and Habitat Recommendation 3 (Improve connectivity and access to outdoor recreation) of the LCCMR Statewide Conservation and Preservation Plan (SCPP); and, pending site availability, may also contribute towards implementation Habitat Recommendation 2A (Acquire high-priority shorelands) and Land Use Recommendation 8 (Protect large blocks of forestland). Also, SNA acquisition and designation of these sites contributes towards achievement of the SNA Long Range Plan.

Specifically, the SNA Program will protect and buffer sites of biodiversity significance by fee acquisition and designation as SNAs approximately 40 acres and by acquisition of Native Prairie Bank (NPB) conservation easements on approximately 40 acres. Conservation easement monitoring will be initiated on new sites and on 13 NPBs previously acquired with ENRTF funding. About 1-2 sites will be protected as designated SNA at about \$5,000 to \$15,000/acre depending on appraised land values plus project costs; and 1-2 sites will be protected as NPB easements at about \$2,000 to \$3,000/acre per statutory formula plus project costs.

# **Summary Budget Information for Result/Activity 1:**

 ENRTF Budget:
 \$569,684

 Amount Spent:
 \$569,416

 Balance:
 \$ 268

WORK PROGRAM AMENDMENT APPROVED on January 10, 2013 to move \$73,665 of the balance from Result 3 to Result 1.

**WORK PROGRAM AMENDMENT APPROVED on March 26, 2013** to move \$25,000 from Result 1 to Result 2.

**WORK PROGRAM AMENDMENT APPROVED on December 13, 2014** to move \$9,455 from Result 1 to Result 2.

**WORK PROGRAM AMENDMENT REQUESTED on August 15, 2014** to move \$6,884 from Result 2 back to Result 1 – due to increased acquisition expenses and reduced need in FY14 for Result 2 monitoring funds.

APPROVED: 08/21/2014

Deliverable/Outcome	Completion Date	Budget
1. fee acquisition & SNA designation of ~40 acres of high quality native habitat	6/30/2014	\$381,900
2. acquisition of NPB conservation easement ~40 acres of native prairie	12/31/2012	\$94,500
3. baseline property reports & initial monitoring for ~14 NPB CEs	6/30/2013	\$47,200

Result Completion Date: 6/30/2014

#### Result Status as of December 20, 2010:

1.1. SNA Acquisition. Acquisition of a 68.89 addition to the Savage Fen SNA acquired in cooperation with the Trust for Public Land closed in November 2010 including a small amount of funding from this appropriation (pro-rated at 0.9 acres). This site includes MCBS mapped wetland communities which are integrally part of the calcareous fen complex, MCBS-mapped hardwood forest bluffs above the fen complex, and frontage on the Credit River. The SNA program has agreed to allow the county and/or city to construct and maintain a non-motorized trail along an existing field road across this site which will benefit SNA users without impacting the natural resources. This was allowed in part because the landowner made a substantial donation towards this project. See attached Table B2 for the funding allocation from all sources for the land costs for this project (not counting transaction costs paid through other appropriations).

A new offer was made in summer 2010 to the landowner to acquire a proposed 21.54-acre addition to **Seminary Fen SNA**, including 12.6 acres of the best quality calcareous fen in the Seminary Fen complex. If an agreement can be reached with the landowner, the appropriation will contribute towards that project.

Three additions to **Hastings Sand Coulee SNA** are underway made possible (all or in part) through this appropriation. These three adjoining parcels totaling almost 184 acres on the north end of the MCBS-recommended Sand Coulee project area are the largest and most important parts of this overall site featuring 13 rare species (including the state endangered plants narrow-leaved pinweed and Jame's polansia, the state threatened Ottoe skipper butterfly, and two state special concern snakes. Specifically, the three tracks are: 78 acres to the northwest to be transferred from WMA to SNA including a steep slope of Dry Sand-Gravel Prairie; 80 acres to the northeast to be acquired from a private party including Dry Sand-Gravel Prairie at the bottom of the aforementioned slope and a very large, but degraded (due to woody encroachment and

lack of fire) area of Dry Sand-Gravel Oak Savanna; and 21.65 acres to be acquired in cooperation with Friends of the Mississippi River (FMR) that is currently owned by the City of Hastings for stormwater management purposes, yet containing Dry Sand-Gravel Prairie which has been actively ecologically-managed in recent years through FMR.

- **1.2. NPB Acquisition.** Two proposed Native Prairie Bank conservation easements in the Correll Working Lands Initiative area of Big Stone County about 1 mile apart are being acquired from the same landowners with the easement terms and conditions complete and the title review and baseline property reports are being done. Specifically, the 17-acre **Akron 31-1 NPB** site is Southern Mesic Prairie of high biodiversity significance that contains small white lady slippers a state special concern (SC) species and may provide habitat for slender milk vetch (SC) as well as upland sandpipers. The tract's proximity to Lac Qui Parle WMA, as well as its location within the Correll Working Lands Initiative Area, allows for collaborative site management between the SNA Program and DNR Wildlife. The 54-acre **Lower Akron 5-1 NPB** site is Southern Mesic Prairie of moderate biodiversity is contiguous to Lac Qui Parle WMA as well as a USFWS easement. A nesting marbled godwit was seen on the tract and upland sandpipers have been seen in the vicinity.
- **1.3. Baseline Property Reports.** As noted above, staff have started to prepare baseline property reports for the two new NPBs being acquired with this fund. Also, staff are starting to compile information needed for baseline property reports to be prepared by contractors (through RFP process) and staff for the backlog of 13 NPBs previously acquired through LCCMR funding.

# Result Status as of May 5, 2011:

#### 1.1. SNA Acquisition.

The additions to **Hastings Sand Coulee SNA** described above have been moved from this funding to 2009 ENRTF appropriations. The acquisition of the addition to **Seminary Fen SNA** is no longer proposed under this funding since the landowner rejected the DNR offer.

Three sets of acquisitions (expected to close in FY12) that were initiated under 2009 ENTRF funds were moved to this appropriation:

At **St Wendel Tamarack Bog**, acquisition of a 10-acre parcel is underway which will also result in receipt of about 60 acres of the tax forfeit land from Stearns County; these 70 acres are all MCBS-mapped tamarack bog.

An offer has been made to acquire an addition of up to 160 acres at **Blanket Flower Prairie SNA** (Clay County) featuring high quality dry sand-gravel prairie (providing habitat for regal fritillary and Nuttal's ground rose) as well as woodland and lakeshore plus adding significant acreage to the SNA which harbors 106 bird species including greater prairie chicken; this site is one of the few ownerships in this area with high quality prairie that has not sold a wind lease to a wind farm developer.

A 52-acres site in the Root River Valley is proposed to become the new the **Rushford Bluffs SNA** (Fillmore County); this site contains very rare dry barrens oak savanna

(southern) with the state endangered rough seeded flameflower and the special concern species clasping milkweed, as well as two types of oak woodland and Mn Threatened timber rattlesnakes. The site is currently for sale in Rushford and adjoins property acquired for a new high school thus providing unique, cooperative environmental education opportunities.

- **1.2. NPB Acquisition**. Acquisition of two Native Prairie Bank conservation easements in the Correll Working Lands Initiative area of Big Stone County described below closed on March 31, 2010: 17.7-acre **Akron 31-1 NPB** and 54.9-acre **Lower Akron 5-1 NPB**. Initial acquisition reports for these two acquisitions will be submitted after the majority of associated costs are processed.
- **1.3. Baseline Property Reports.** The baseline property reports for Akron 31-1 and Lower Akron 5-1 NPB conservation easements were completed and signed by the landowners at the acquisition closings. See Result 3.3. below regarding the RFP for contractor-prepared baselines to address the backlog.

# Result Status as of December 1, 2011:

# 1.1 SNA Acquisition.

At **St Wendel Tamarack Bog**, acquisition of a 10-acre parcel has closed and the resulting receipt (deeply discounted acquisition) of about 60 acres of the tax forfeit land from Stearns County is in progress; these 70 acres are all MCBS-mapped tamarack bog.

Acquisition closed of the 135.93-acre addition to **Blanket Flower Prairie SNA** (Clay County – partially paid through this appropriation) featuring high quality dry sand-gravel prairie (providing habitat for regal fritillary and Nuttal's ground rose) as well as woodland and lakeshore plus adding significant acreage to the SNA which harbors 106 bird species including greater prairie chicken; this site is one of the few ownerships in this area with high quality prairie that has not sold a wind lease to a wind farm developer.

Acquisition is continuing of the 52-acre site in the Root River Valley that is proposed to become the new the **Rushford Bluffs SNA** (Fillmore County) – but was significantly slowed due to issues with the deed and site cleanup. This site contains very rare dry barrens oak savanna (southern) with the state endangered rough seeded flameflower and the special concern species clasping milkweed, as well as two types of oak woodland and Mn Threatened timber rattlesnakes. The site is currently for sale in Rushford and adjoins property acquired for a new high school thus providing unique, cooperative environmental education opportunities.

Acquisition is underway on two parcels that would become additions to the Englund Ecotone SNA (Benton County) – that are already on this appropriation's list and which may be paid in part through this appropriation. Up to 540 acres under one ownership is predominantly mapped by MCBS as having high biodiversity significance and contains one example of a rare natural feature (Old Field Toadflax). The site also supports two examples of a Native Plant Community: Pin Oak-Bur Oak Woodland and Sedge Meadow. This is adjoined by 80 acres under separate ownership which is also mapped by MCBS as oak woodland. Both parcels are currently being appraised by the DNR.

**1.2. NPB Acquisition & 1.3 Baseline Property Reports.** See May report above on 2 NPB acquisitions including baseline property reports. The Prairie Stewardship Plan contract discussed under Result 3.3. below includes preparation of 5 NPB baselines to address in part the backlog.

# Result Status as of April 27, 2012:

# 1.1. SNA Acquisition.

- At St Wendel Tamarack Bog, acquisition of 60 acres of the tax forfeit land from Stearns County is still in progress.
- Acquisition is continuing of the 52-acre site in the Root River Valley that is proposed to become the new the **Rushford Bluffs SNA** (Fillmore County).
- At Englund Ecotone SNA, an offer on acquiring the 540-acre parcel was turned down by the landowner; negotiations are continuing with this landowner to acquire access to the existing land-locked SNA. Acquisition of the 80-acre parcel is being pursued with other funding.
- Because of the change in status of the Englund Ecotone projects, acquisition of a 319-acre parcel to become the new Mille Lacs Moraine SNA (the first SNA in Crow Wing County) will be paid in part with this funding (a majority of the funding will be RIM Match; accomplishment acres will be pro-rated). This property has been optioned. This site lies within the larger, 82-square mile MCBS-mapped Mille Lacs Moraine Site of Outstanding Biodiversity Significance, This site features lakes and wetlands embedded in steep moraine ridges covered with good-quality red oak-basswood forest, and associated rare species, including red-shouldered hawk, cerulean warbler, and several plant species.
- **1.2. NPB Acquisition.** This result was completed previously; no new accomplishments since Dec 2011 update.
- **1.3 Baseline Property Reports.** Eleven baselines are in the process of being prepared, two will be completed by contractors in June 2012 and nine are being completed by DNR staff.

# Result Status as of October 31, 2012:

#### 1.1. SNA Acquisition.

- At St Wendel Tamarack Bog, acquisition of 60 acres of the tax forfeit land from Stearns County is still in progress; the DNR and County are trying to resolve an outstanding issue of trying to provide better parking for the SNA.
- An offer was made and rejected by the landowner to acquire a 52-acre site in the Root River Valley that was proposed to become the new the Rushford Bluffs SNA (Fillmore County).
- At Englund Ecotone SNA, an offer on acquiring the 540-acre parcel was turned down by the landowner.
- Acquisition of a 319-acre parcel to become the new Mille Lacs Moraine SNA (the
  first SNA in Crow Wing County) closed on June 13, 2012 paid in part with this
  funding (2.6% for 8.3 acres with this funding; 97.4% for 310.7 acres with RIM Match
  generated by The Nature Conservancy). This site lies within the larger, 82-square
  mile MCBS-mapped Mille Lacs Moraine Site of Outstanding Biodiversity
  Significance, This site features lakes and wetlands embedded in steep moraine
  ridges covered with good-quality red oak-basswood forest, and associated rare

- species, including red-shouldered hawk, cerulean warbler, and several plant species. An offer was turned down by the landowner in fall 2012 to acquire a second almost adjoining 241-parcel to be part of this SNA.
- **1.2. NPB Acquisition.** This result was completed previously; no new accomplishments since Dec 2011 update.
- **1.3. Baseline Property Reports.** Seventeen baselines have been prepared, ten have been completed by a contractor who concurrently did the Prairie Stewardship Plans for these Native Prairie Bank easements (see Result 3.3 below), seven baselines were completed by SNA Program staff with this appropriation including two acquired with this funding (see Result 1.2 above and \*\* below).

NPB Name	County	Prepared by
Akron 31-1 **	Big Stone	SNA staff
Big Stone 6	Big Stone	SNA staff
Lower Akron 5-1 **	Big Stone	SNA staff
Otrey 26	Big Stone	SNA staff
Storden 4-2	Cottonwood	contractor
Ann 25	Cottonwood	contractor
Petersburg 26	Jackson	contractor
Petersburg 33	Jackson	contractor
Christiana 31 A	Jackson	contractor
Christiana 31 B	Jackson	contractor
Camp Release 32	Lac Qui Parle	SNA staff
Hantho 17	Lac Qui Parle	SNA staff
Lake Benton 19-1	Lincoln	SNA staff
Custer 15	Lyon	contractor
Holly 17	Murray	contractor
Pilegard	Murray	contractor
Johnsonville 30	Redwood	contractor

#### Result Status as of March 14, 2013:

# 1.1. SNA Acquisition.

- Acquisitions of additions to two SNAs closed in fall 2011 a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation).
- At St Wendel Tamarack Bog, acquisition of 60 acres of the tax forfeit land from Stearns County is still in progress; the DNR and County have reached an agreement to resolve an outstanding issue of trying to provide parking for the SNA which is a county condition of this project.
- Acquisition of a new 319-acre new Mille Lacs Moraine SNA closed in June 2012 (partly funding with this appropriation.) Acquisition may be re-initiated of the second almost adjoining 241-parcel to be part of this SNA (whose landowner turned down a previous offer).
- **1.2. NPB Acquisition.** This result was completed previously; no new accomplishments since Dec 2011 update.
- **1.3 Baseline Property Reports.** This result was completed previously; no new accomplishments since October 2012 status report above.

Result Status as of August 23, 2013 (with changes since March 2013 underlined): 1.1. SNA Acquisition.

- Acquisitions of additions to two SNAs closed in fall 2011 a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation).
- At St Wendel Tamarack Bog, acquisition of 60 acres of the tax forfeit land from Stearns County is still in progress; the DNR and County reached an agreement to resolve an outstanding issue of trying to provide parking for the SNA which is a county condition of this project; complications in locating the parking are being resolved; acquisition of another 12-acre parcel of private land between the two primary units of the SNA is underway. Another acquisition is also being initiated that could be an addition to St Wendell Tamarack Bog or Partch Woods SNA (see below).
- Acquisition of a new 319-acre new Mille Lacs Moraine SNA closed in June 2012 (partly funding with this appropriation.) Acquisition has been reinitiated (new appraisal is underway) of the second almost adjoining 241-parcel to be part of this SNA (whose landowner turned down a previous offer).

**WORK PROGRAM AMENDMENT APPROVED on September 5, 2013** to add three additional acquisitions to possibly use this funding in order to assure full expenditure of this funding by June 2014:

- The proposed new Brownsville Bluff SNA (Houston Co) of up to about 290 acres would protect one of only two authenticated hibernacula (den sites) in Minnesota of the threatened Western Ratsnake; this scenic bluff site overlooking the Mississippi River also contains Southern Dry Mesic Oak-Hickory Woodland (FDs38) and Southern Mesic Oak-Basswood Forest (MHs38).
- The SNA Program is interested in acquiring (with assistance of The Conservation Fund) up to 80 acres of a parcel on the market which is proposed to be split between an addition of Red Oak-Basswood Forest, Sedge Meadow, and degraded oak woodland-savanna to Partch Woods SNA (Stearns Co) and across the county road and addition of high quality Tamarack Swamp (Southern) and Northern Rich Fen (Basin) St Wendel Tamarack Bog SNA.
- The proposed new 890-acre Badoura Jack Pine SNA (Hubbard Co) which contains Central Dry Pine Woodland (FDc23 with jack pine overstory and dry prairie understory) has been reduced in western Minnesota from 39 stands 30 years ago, to 10 stands today (and of those 10 only 5 are large enough to harbor a full species compliment for the community). Therefore this community (including the two sub-communities: FDc23a1 and FDc23a2) has been recommended for S1/S2 status by MBS ecologists familiar with the community. The biggest threat to Jack Pine forests is potato farming, and logging, both of which are occurring in this area of the state. The acquisition is primarily being pursued with funding through the Lessard-Sam Outdoor Heritage Council, but current LSOHC appropriations are insufficient to protect this threatened parcel.
- **1.2. NPB Acquisition.** This result was completed previously; no new accomplishments since Dec 2011 update.

**1.3 Baseline Property Reports.** This result was completed previously; no new accomplishments since October 2012 status report above.

# Result Status as of March 1, 2014:

- 1.1. SNA Acquisition.
- Acquisitions of additions to two SNAs closed in fall 2011 a 10-acre addition to St. Wendel Tamarack Bog SNA and a 136-acre addition to Blanket Flower Prairie SNA (the later partly funded with this appropriation).
- At St Wendel Tamarack Bog, acquisition of 60 acres of the tax forfeit land from Stearns County is still in progress; the DNR and County reached an agreement to resolve an outstanding issue of trying to provide parking for the SNA which is a county condition of this project; complications in locating the parking are being resolved; acquisition of another 12-acre parcel of private land between the two primary units of the SNA is optioned pending county board approval dependent upon completion of a temporary parking area.
- Acquisition of a new 319-acre new Mille Lacs Moraine SNA closed in June 2012 (partly funding with this appropriation.) A second offer made on an almost adjoining 241-parcel to be part of this SNA was turned down by the landowner.
- This appropriation will fund about 57 acres of the 560-acre first phase of the
  acquisition of the proposed new 900-acre Badoura Jack Pine SNA (Hubbard Co) –
  the landowner has accepted DNR's offer and the project will be optioned in March.
- **1.2. NPB Acquisition.** This result was completed previously; no new accomplishments since Dec 2011 update.
- **1.3 Baseline Property Reports.** This result was completed previously; no new accomplishments since October 2012 status report above.

#### **Final Report Summary:**

**1.2. SNA Acquisition.** A total of 162 acres of biodiversity significance were acquired through this appropriation helping create two new SNAs and expanding two existing SNAs.

A 136-acre addition to **Blanket Flower Prairie SNA** (Clay County) was acquired in part with this appropriation (68 acres pro-rated acres for this appropriation). The site features high quality Dry Sand-Gravel Prairie (providing habitat for regal fritillary and Nuttal's ground rose) as well as woodland and lakeshore plus adding significant acreage to the SNA which harbors 106 bird species including greater prairie chicken. This site is one of the few ownerships in this area with high quality prairie that has not sold a wind lease to a wind farm developer.

A new 319-acre **Mille Lacs Moraine SNA** (Crow Wing County) was acquired in part with this appropriation (8.3 acres pro-rated for this appropriation). This site lies within the larger, 82-square mile MCBS-mapped Mille Lacs Moraine Site of Outstanding Biodiversity Significance. The property acquired completely encompasses Sunfish Lake and part of Fawcett Lake which have natural shorelines. These lakes and wetlands are embedded in steep moraine ridges covered with good-quality red oak-basswood forest,

and associated rare species, including red-shouldered hawk, cerulean warbler, and several plant species.

The first 540-acre phase of a new 900-acre **Badoura Jack Pine Forest SNA** (Hubbard County) was acquired in part with this appropriation (63.9 acres pro-rated for this appropriation). The site contains one of the largest remaining examples of the critically imperiled Central Dry Pine Woodland plant community type with jack pine overstory and an understory of both prairie and northern forest species. A portion of the site was harvested prior to SNA acquisition, yet has an intact ground layer into which jack pine is naturally seeding. This offers opportunities to manage, observe, and research successional processes as the jack pine spread back into the openings.

Several additions to the **St. Wendel Tamarack Bog SNA** (Stearns County) were pursued with this appropriation. A 10-acre parcel and a 12-acre parcel were acquired with this appropriation containing MCBS-mapped Minerotrophic Tamarack Swamp and habitat for rare species. Despite considerable efforts and expenses, the state was not able to complete acquisition of 60-acre tax forfeit land. County Board authorization of DNR acquisition of tax forfeit lands is contingent on a parking area being created for this SNA. All of the state owned lands were wetlands and inappropriate (or not legally available) for parking despite SNA buying wetland replacement credit and working with the county to find alternative sites. The state made offers to lease or acquire the parcels planned for parking, but despite considerable efforts was not able to complete these projects due to serious private landowner title, back taxes, and survey issues. Then, this funding expired before the state and county could reach an agreement regarding the tax forfeit land transfer based on a proposal for a parking area on the 12-acre parcel acquired.

DNR acquisitions during the timeframe of this appropriation were challenging due to numerous landowners turning down offers because the appraised value did not meet the landowners' expectations. The other difficulties in completing projects reinforce the need to allow extra time to work on unexpected problems that seem to arise towards the end of complicated projects.

- 1.3. NPB Acquisition. Acquisition of two Native Prairie Bank conservation easements protected native prairie on 72.6 acres in the Correll Working Lands Initiative area of Big Stone County. Specifically, the 17.7-acre Akron 31-1 NPB site is Southern Mesic Prairie of high biodiversity significance that contains small white lady slippers a state special concern (SC) species and may provide habitat for slender milk vetch (SC) as well as upland sandpipers. The tract's proximity to Lac Qui Parle WMA, as well as its location within the Correll Working Lands Initiative Area, allows for collaborative site management between the SNA Program and DNR Wildlife. The 54.9-acre Lower Akron 5-1 NPB site is Southern Mesic Prairie of moderate biodiversity is contiguous to Lac Qui Parle WMA as well as a USFWS easement. A nesting marbled godwit was seen on the tract and upland sandpipers have been seen in the vicinity.
- **1.3 Baseline Property Reports.** Seventeen baselines have been prepared, ten have been completed by a contractor who concurrently did the Prairie Stewardship Plans for these Native Prairie Bank easements (see Result 3.3 below), seven baselines were

completed by SNA Program staff with this appropriation including two acquired with this funding (see Result 1.2 above and \*\* below).

NPB Name	County	Prepared by
Akron 31-1 **	Big Stone	SNA staff
Big Stone 6	Big Stone	SNA staff
Lower Akron 5-1 **	Big Stone	SNA staff
Otrey 26	Big Stone	SNA staff
Storden 4-2	Cottonwood	contractor
Ann 25	Cottonwood	contractor
Petersburg 26	Jackson	contractor
Petersburg 33	Jackson	contractor
Christiana 31 A	Jackson	contractor
Christiana 31 B	Jackson	contractor
Camp Release 32	Lac Qui Parle	SNA staff
Hantho 17	Lac Qui Parle	SNA staff
Lake Benton 19-1	Lincoln	SNA staff
Custer 15	Lyon	contractor
Holly 17	Murray	contractor
Pilegard	Murray	contractor
Johnsonville 30	Redwood	contractor

#### RESULT/ACTIVITY 2: Native Habitat Restoration & Enhancement

#### **Description:**

The health and sustainability of native biodiversity of native prairie, savanna, old growth forest, and other native plant communities will be improved through restoration and enhancement activities and understanding of rare resources increased through interpretive signage. This will contribute towards implementation of the SWAP through restoration of degraded and rare land features (particularly native prairie, savanna, and forest) needed to support SGCN and thereby helps achieve Habitat Recommendation 5 (Restore lands, wetlands, and wetland-associated watersheds) and Habitat Recommendation 7 (Keep water on the landscape) of the SCPP. This project also incorporates science-based monitoring which is crucial for evaluation of whether or not management actions are achieving desired outcomes and subsequently re-directing adaptive management decisions. The SCPP recognizes that by investing in knowledge infrastructure through activities such as monitoring "action and policy will become more effective and precise over time" (p.25. Furthermore, this project's monitoring activities address SWAP's Strategy II C (Monitor long-term changes to SGCN populations and habitats) and Strategy II D (Create performance measures and maintain information systems).

Specifically, restoration and enhancement activities will be completed on about 3200 acres at about 20 SNAs, 8 NPBs, and 8 native prairie stewardship sites. Interpretive signs-kiosks will be developed and installed at about 4 SNAs. Site development activities (e.g. signs, fences, parking areas, site clean-up) will be completed at about 5 sites. Management at about 18 SNA or NPB sites will be monitored for adaptive Scientific and Natural Areas and Native Prairie Restoration, Enhancement and Acquisition 16

management purposes. Also, additional features will be added to the Division's Adaptive Management Spatial Database (currently under development) in order to associate monitoring results with management activities and their measurable objectives.

Restoration and enhancement activities – including bringing sites acquired up to minimum standards – will be carried out by DNR staff-SNA crews, Minnesota Conservation Corps (MCC), Sentence to Service (STS), volunteers, and/or contractors. Activities include seed collection, planting, exotics control, woody encroachment removal, site clean-up, signing (including development and installation of interpretive kiosks), fencing, prescribed burns, management plan preparation, and monitoring (and associated adaptive management database development). All restoration will use seeds or plants of a local ecotype, collected whenever possible from onsite or within 25 miles.

**Summary Budget Information for Result/Activity 2:** 

ENRTF Budget: \$1,010,231 Amount Spent: \$1,010,231 Balance: \$0

**WORK PROGRAM AMENDMENT APPROVED on January 10, 2013** to move \$143,060 of the balance from Result 3 to Result 2.

**WORK PROGRAM AMENDMENT APPROVED on March 26, 2013** to move \$25,000 from Result 1 to Result 2.

**WORK PROGRAM AMENDMENT APPROVED on December 13, 2013** to move \$9,455 from Result 1 to Result 2.

**WORK PROGRAM AMENDMENT REQUESTED on August 15, 2014** to move \$6,884 from Result 2 back to Result 1 – due to increased acquisition expenses and reduced need in FY14 for Result 2 monitoring funds.

APPROVED: 08/21/2014

Deliverable/Outcome	Completion	Budget
	Date	
1. ~90 ac: prairie, forest, etc. reconstruction	6/30/2013	\$94,300
2. ~250 ac: woody removal & exotics species	6/30/2013	\$188,700
treatment		
3. ~ 2900 ac: prescribed burns	6/30/2013	\$330,200
4. ~4 SNA interpretive kiosks installed &	12/31/2013	\$18,900
development work on ~5 sites		
5. adaptive management plans completed for ~9	6/30/2013	\$66,000
SNAs (incl new acquisitions as time permits)		
6. adaptive management monitoring on ~ 18 SNA-	6/30/2014	\$141,500
NPB sites & development of SNA adaptive		
management spatial database		

Result Completion Date: 6/30/2014

Result Status as of December 20, 2010: 2.1. Plant Community Reconstruction & Rehabilitation: Seed was collected on 14 acres at 4 NPB sites for prairie reconstruction or rehabilitation projects at those sites; seed was also collected on about 4 acres of at 1 SNA for a rehabilitation at that site. 2.2. Woody Removal & Invasive **Species:** CCM worked with SNA staff to inventory invasive species on 12 NPB sites; herbaceous species control activities were completed on about 35 acres at 7 NPB sites (including CCM work at 1 SNA and 4 NPB sites) and about 2 acres total at 3 SNA sites (including CCM work at 1 site); woody species control activities were completed on about 33 acres at 6 NPB sites. 2.3. Prescribed Burning: About 10.5 miles of firebreaks were installed at 20 NPB sites (including 2 done by CCM) and another 2 miles of firebreaks partially installed at 2 SNAs and 5 NPBs in preparation for proposed spring 2011 prescribed burns; progress was made on burn plans for about 480 acres at 5 NPBs. **2.4. Development:** for sites acquired using LCCMR funding, boundary, entry, and/or rules signs were installed at 3 SNAs and construction of a parking area initiated; 1.3 miles of fence on 2 NPBs and 1.8 miles at 1 SNA were removed (including 1 NPB & 1 SNA done by CCM), site cleanup was completed at 1 NPB by CCM and initiated at 2 SNAs as part of native plant community restoration and enhancement work. 2.5. Management Planning: a new adaptive management plan template using new management activity definitions and categories synchronized with the Adaptive Management Spatial Database (AMSD) and becoming the basis for adaptive management monitoring has been completed; with this and other funding an RFP is drafted to contract to have about 7 management plans written in addition to those that will be prepared by SNA staff. 2.6. Monitoring & AMSD: AMSD Phase 1 user documentation and staff training was completed which is facilitating tracking of all the site specific restoration, management, and technical assistance work reported on here; AMSD improvement processes are also in place; a proposal (including MCBS staff input) has been completed for IT development of AMSD Phase 2 which will integrate site specific priority features, conditions, factors, objectives, and indicators needed for ecological monitoring, measuring management impacts, and adapting management strategies.

Result Status as of May 5, 2011: 2.1. Plant Community Reconstruction & Rehabilitation: Since July 1, seed was collected on 14 acres at 4 NPB sites for prairie reconstruction or rehabilitation projects at those sites; collected seed was planted (broadcast) on 4.5 acres of one SNA site. 2.2. Woody Removal & Invasive Species: Since July 1, CCM worked with SNA staff to inventory invasive species on 12 NPB sites; herbaceous species control activities were completed on about 58 acres at 10 NPB sites (including CCM work at 4 NPB sites) and about 10 acres at 5 SNA sites (including CCM work at 1 site); woody species control activities were completed on about 96 acres at 12 NPB sites and about 13 acres at 1 SNA. 2.3. Prescribed Burning: Since July 1, about 16.7 miles of firebreaks were installed at 25 NPB sites (including 2 done by CCM) and another 6.9 miles of firebreaks installed at 11 SNAs and 5 NPBs in preparation for proposed spring 2011 prescribed burns; Fall 2010 prescribed burns were completed on 127 acres; spring prescribed burning is underway through MCC and a temporary burn crew. 2.4. Development: Since July 1, boundary, entry, and/or rules signs were installed at 6 SNAs; construction of a parking area at 1 SNA

was completed; 1.3 miles of fence on 2 NPBs and 1.8 miles at 1 SNA were removed (including 1 NPB & 1 SNA done by CCM); in order to protect rare resources almost 1 mile of fence was repaired and another mile of fence built at 3 SNAs; site cleanup was completed at 1 NPB by CCM and at 2 SNAs as part of native plant community restoration and enhancement work. 2.5. Management Planning: Three new adaptive management plans are being done through three contractors (selected through the state RFP process): Blanket Flower SNA (404 acres), Avon Hills SNA (354 acres), and St. Wendel Tamarack Bog SNA (717 acres – funded in part with this appropriation – including the 70 acres currently being acquired). 2.6. Monitoring & AMSD (Adaptive Management Spatial Database: Priority sites for adaptive management monitoring were identified by regional staff. An informal RFP was posted for monitoring work on prairie SNA and NPBs. Review of proposals is expected in early June, with the contract awarded in July. Forest and other non-prairie monitoring is being coordinated with regional staff, and contracts expected to be awarded in June. Training was provided to all SNA staff in using AMSD to track, map, and report accomplishments for all SNA and NPB restoration and enhancement activities. AMSD Phase 2 priority feature functionality is being tested and soon to be made available in the production system. New and enhanced functionality is now available to make it easier for users to maintain information. Ways for collecting monitoring data electronically are being evaluated and tested for this coming field season.

Result Status as of December 1, 2011 – CUMULATIVE STATUS since July 1, 2010: 2.1. Plant Community Reconstruction & Rehabilitation: Seed was collected on 38 acres at 3 SNAs and on 45 acres at 7 NPB sites for prairie reconstruction or rehabilitation projects at those sites; 60 acres at SNAs sites were prepared for plant community reconstruction; collected seed was planted (broadcast or drilled) on 7.6 acres at 2 SNAs and at 11.0 acres at 3 NPB sites along with selective mowing of reconstructed sites. 2.2. Woody Removal & Invasive Species: CCM worked with SNA staff to inventory invasive species across 1,481 acres on 12 NPB sites and on 1 of 2 SNAs comprising 59 acres; herbaceous species control activities were completed on 83.3 acres at 22 SNA sites (including CCM work at 2 sites) and 78.4 acres at 25 NPB sites (including CCM work at 3 NPB sites) and woody species control activities were completed on 87.4 acres at 6 SNAs (including CCM work at 2 sites) and on 131.5 acres at 15 NPB sites (including CCM at 1 NPB site). 2.3. Prescribed Burning: About 12.5 miles of firebreaks installed at 15 SNAs and another 16.7 miles of firebreaks were installed at 34 NPB sites (including 3 done by CCM) in preparation for prescribed burns; prescribed burns were completed on 1,410 acres at 12 SNAs and on 1,113 acres at 18 NPB sites (involving CCM on burns at 25 sites); 2.4. Development: Boundary, entry, and/or rules signs were installed at 16 SNAs (including work done by CCM at 4 sites) and boundary signs were installed at 5 NPB sites; parking areas were constructed at 2 SNAs: 1.8 miles of fence were removed at 1 SNA (done by CCM) and 400 feet of fence removed on 1 NPB; in order to protect rare resources about .85 miles of fence was repaired and another 1.3 miles of fence built at 3 SNAs; site cleanup was completed at 3 SNAs and at 1 NPB (by CCM) as part of native plant community restoration and enhancement work. **2.5. Management Planning:** Three new adaptive management plans have been completed through three contractors (selected through the state RFP process): Blanket Flower SNA (404 acres), Avon Hills SNA (354 acres), and St. Wendel Tamarack Bog SNA (717 acres – 97% funded with this appropriation – including the 70

acres currently being acquired). **2.6. Monitoring & AMSD (Adaptive Management Spatial Database:** Adaptive management monitoring was completed on eight prairie sites 6 SNA and 2 NPB) with contractors completing a total of 131 transects and eight relevés. Complications due to the government shutdown prevented completion of monitoring in other habitat types and they will be completed in May-June 2012. Priority feature components in the Adaptive Management Spatial Database (AMSD) were tested and finalized for production system; and additional functionality improvements in AMSD were developed. An electronic field data collection application was developed to improve quality control and data collection efficiency.

Result Status as of April 27, 2012 – CUMULATIVE STATUS since July 1, 2010: 2.1. Plant Community Reconstruction & Rehabilitation: Seed was collected on 38 acres at 3 SNAs and on 45 acres at 7 NPB sites for prairie reconstruction or rehabilitation projects at those sites; 60 acres at SNAs sites were prepared for plant community reconstruction; collected seed was planted (broadcast or drilled) on 12 acres at 2 SNAs and at 17.7 acres at 4 NPB sites along with selective mowing of reconstructed sites. 2.2. Woody Removal & Invasive Species: CCM worked with SNA staff to inventory invasive species across 1,481 acres on 12 NPB sites and on 1 of 2 SNAs comprising 59 acres; herbaceous species control activities were completed on 130.3 acres at 23 SNA sites (including CCM work at 2 sites) and 78.4 acres at 25 NPB sites (including CCM work at 3 NPB sites) and woody species control activities were completed on 368.2 acres at 9 SNAs (including CCM work at 2 sites) and on 140.5 acres at 15 NPB sites (including CCM at 1 NPB site). 2.3. Prescribed Burning: About 23.8 miles of firebreaks installed at 22 SNAs and another 25.3 miles of firebreaks were installed at 34 NPB sites (including 3 done by CCM) in preparation for prescribed burns; prescribed burns were completed on 1518 acres at 15 SNAs and on 1,113 acres at 18 NPB sites (involving CCM on burns at 25 sites) Note: this does not include all burns in spring 2012; 2.4. Development: Boundary, entry, and/or rules signs were installed at 19 SNAs (including work done by CCM at 4 sites) and boundary signs were installed at 6 NPB sites; parking areas were constructed at 2 SNAs; 1.8 miles of fence were removed at 1 SNA (done by CCM) and 400 feet of fence removed on 1 NPB; in order to protect rare resources about .85 miles of fence was repaired and another 1.3 miles of fence built at 3 SNAs; site cleanup was completed at 6 SNAs and at 1 NPB (by CCM) as part of native plant community restoration and enhancement work.

- **2.5. Management Planning:** This result was completed previously; no new accomplishments since Dec 2011 update. Three new adaptive management plans have been completed through three contractors (selected through the state RFP process): Blanket Flower SNA (404 acres), Avon Hills SNA (354 acres), and St. Wendel Tamarack Bog SNA (717 acres 97% funded with this appropriation including the 70 acres currently being acquired).
- **2.6. Monitoring & AMSD:** No new accomplishments since Dec 2011 update but narrative is rewritten below to better reflect cumulative accomplishments to date. Completed AMSD Phase 1 user documentation and staff training which facilitates tracking of site specific restoration, management, and technical assistance work. Training was provided to all SNA staff in using AMSD to track, map, and report accomplishments for all SNA and NPB restoration and enhancement activities. Several AMSD improvements completed and additional improvements are in process.

Improvements include new and enhanced functionality to make it easier for users to maintain information, as well as required updates so that AMSD is aligned with the new SWIFT financial management system.

Solicited staff input, through a series of design meetings, for AMSD Phase 2 which integrates site specific priority features, conditions, factors, objectives, and indicators needed for ecological monitoring, measuring management impacts, and adaptive management strategies. Priority feature components in the AMSD were developed, tested, and finalized for production system. Review of additional Phase 2 functionality is ongoing.

Priority sites for adaptive management monitoring were identified by regional SNA staff. Adaptive management monitoring was completed on eight prairie sites (6 SNA and 2 NPB) in August-September 2011 with contractors completing a total of 131 transects and eight relevés. Monitoring data was pooled with a multi-organization Grassland Monitoring Team (GMT) database to inform, test, and develop a state-transition Adaptive Management Model. Model completion is expected in late spring 2012 and will provide real-time management recommendations to managers. Additional monitoring in prairie and other habitat types will be completed in 2012-2013. An electronic field data collection application was developed to improve quality control and data collection efficiency.

# Result Status as of October 31, 2012 – CUMULATIVE STATUS since July 1, 2010: Changes to what was reported in April 2012 are underlined below.

- 2.1. Plant Community Reconstruction & Rehabilitation: Seed was collected on more 82 acres at 8 SNAs and on more than 42.5 acres at 7 NPB sites for prairie reconstruction or rehabilitation projects; collected seed was planted (broadcast or drilled) on 16.5 acres at 3 SNAs and at 30.1 acres at 7 NPB sites along with selective mowing of reconstructed sites. 2.2. Woody Removal & Invasive Species: CCM worked with SNA staff to inventory invasive species across 1804 acres on 18 NPB sites and across 842 acres on 8 SNAs; herbaceous species control activities were completed on 201.3 acres at 27 SNA sites (including CCM work at 5 sites) and 107.8 acres at 26 NPB sites (including CCM work at 6 NPB sites) and woody species control activities were completed on 636.7 acres at 14 SNAs (including CCM work at 5 sites) and on 180.9 acres at 16 NPB sites (including CCM at 7 NPB sites); and 4 invasive species boot brush stands/informational signs were installed at 3 SNAs (1 involving CCM). 2.3. Prescribed Burning: About 27.6 miles of firebreaks installed at 24 SNAs (including 2 done by CCM) and another 29.8 miles of firebreaks were installed at 36 NPB sites in preparation for prescribed burns; prescribed burns were completed on 2,514 acres at 28 SNAs (involving CCM on burns at 9 sites) and on 1,533 acres at 27 NPB sites (involving CCM on burns at 9 sites). **2.4. Development:** Boundary, entry, and/or rules signs were installed at 26 SNAs (including work done by CCM at 8 sites) and boundary signs were installed at 6 NPB sites (involving CCM on burns at 4 sites); parking areas were constructed at 2 SNAs; 1.8 miles of fence were removed at 1 SNA (done by CCM) and 400 feet of fence removed on 1 NPB; in order to protect rare resources about 1.23 miles of fence was repaired and another 1.3 miles of fence built at 4 SNAs; site cleanup was completed at 5 SNAs and at 1 NPB (by CCM) as part of native plant community restoration and enhancement work.
- **2.5. Management Planning:** This result was completed previously; no new accomplishments since Dec 2011 update. Three new adaptive management plans

have been completed through three contractors (selected through the state RFP process): Blanket Flower SNA (404 acres), Avon Hills SNA (354 acres), and St. Wendel Tamarack Bog SNA (717 acres – 97% funded with this appropriation – including the 70 acres currently being acquired).

**2.6. Monitoring & AMSD:** From July 1, 2010 to October 31, 2012, adaptive management monitoring was completed on 12 prairie sites (10 SNA and 2 NPB) with contractors completing a total of 165 transects and 10 relevés. Monitoring data was pooled with a multi-organization Grassland Monitoring Team (GMT) database to inform, test, and develop a state-transition Adaptive Management Model. Model completion is expected in late spring 2012 and will provide real-time management recommendations to managers.

Completed AMSD Phase 1 user documentation and staff training which facilitates tracking of site specific restoration, management, and technical assistance work. Training was provided to all SNA staff in using AMSD to track, map, and report accomplishments for all SNA and NPB restoration and enhancement activities. Several AMSD improvements completed and additional improvements are in process. Improvements include new and enhanced functionality to make it easier for users to maintain information, as well as required updates so that AMSD is aligned with the new SWIFT financial management system.

Solicited staff input, through a series of design meetings, for AMSD Phase 2 which integrates site specific priority features, conditions, factors, objectives, and indicators needed for ecological monitoring, measuring management impacts, and adaptive management strategies. AMSD improvements and priority feature components of AMSD Phase 2 completed. Review of additional Phase 2 functionality is ongoing.

Result Status as of March 14, 2013: - CUMULATIVE STATUS since July 1, 2010: 2.1. Plant Community Reconstruction & Rehabilitation: Seed was collected on more 141.1 acres at 9 SNAs and on more than 45.3 acres at 7 NPB sites for prairie reconstruction or rehabilitation projects; collected seed was planted (broadcast or drilled) on 15.4 acres (corrected from above due to previous estimating) at 3 SNAs and at 40.5 acres at 7 NPB sites along with selective mowing of reconstructed sites. 2.2. Woody Removal & Invasive Species: CCM worked with SNA staff to inventory invasive species across 1804 acres on 18 NPB sites and across 842 acres on 8 SNAs; herbaceous species control activities were completed on 209.8 acres at 28 SNA sites (including CCM work at 5 sites) and 102.4 acres corrected from above due to previous estimating) at 26 NPB sites (including CCM work at 6 NPB sites) and woody species control activities were completed on 635.44 acres (corrected from above due to previous estimating) at 15 SNAs (including CCM work at 5 sites) and on 180.7 acres (corrected from above due to previous estimating) at 16 NPB sites (including CCM at 7 NPB sites); and 4 invasive species boot brush stands/informational signs were installed at 3 SNAs (1 involving CCM). 2.3. Prescribed Burning: About 30.8 miles of firebreaks installed at 24 SNAs (including 2 done by CCM) and another 28.1 miles corrected from above due to previous estimating) of firebreaks were installed at 35 NPB sites in preparation for prescribed burns; prescribed burns were completed on 2,776 acres corrected from above due to previous estimating) at 26 SNAs (involving CCM on burns at 9 sites) and on 1,443 acres corrected from above due to previous estimating) at 27 NPB sites (involving CCM on burns at 9 sites). **2.4. Development:** Boundary, entry, and/or rules signs were installed at 24 SNAs (including work done by CCM at 8

sites) and boundary signs were installed at 6 NPB sites (involving CCM on burns at 4 sites); parking areas were constructed at 2 SNAs; 1.8 miles of fence were removed at 1 SNA (done by CCM) and 400 feet of fence removed on 1 NPB; in order to protect rare resources about 1.23 miles of fence was repaired and another 1.3 miles of fence built at 4 SNAs; site cleanup was completed at 5 SNAs and at 1 NPB (by CCM) as part of native plant community restoration and enhancement work.

2.5. Management Planning: In addition to the management plans originally completed through this fund (see Dec 2011 update above), this appropriation is contributing to the completion 26 plans primarily funded through the 2011 ENRTF appropriation and a matching federal SWG grant. Final results will be pro-rated between the funds.

2.6. Monitoring & AMSD: Changes from October 2012 status update above are as underlined here: Model completion is expected in summer 2013 and will provide real-time management recommendations to managers; 2012 monitoring data was entered and verified, and is currently being uploaded to the GMT database. AMSD Phase 2 build is expected to begin in summer 2013.

Result Status as of August 23, 2013: - CUMULATIVE STATUS since July 1, 2010: 2.1. Plant Community Reconstruction & Rehabilitation: Seed was collected on more 141.1 acres at 9 SNAs and on more than 45.3 acres at 7 NPB sites for prairie reconstruction or rehabilitation projects; collected seed was planted (broadcast or drilled) on 15.4 acres at 3 SNAs and at 40.5 acres at 7 NPB sites along with selective mowing of reconstructed sites. 2.2. Woody Removal & Invasive Species: CCM worked with SNA staff to inventory invasive species across 1804 acres on 18 NPB sites and across 842 acres on 8 SNAs; herbaceous species control activities were completed on 209.8 acres at 28 SNA sites (including CCM work at 5 sites) and 102.4 acres at 26 NPB sites (including CCM work at 6 NPB sites) and woody species control activities were completed on 649.3 acres at 17 SNAs (including CCM work at 5 sites) and on 180.7 acres at 18 NPB sites (including CCM at 9 NPB sites); and 4 invasive species boot brush stands/informational signs were installed at 3 SNAs (1 involving CCM). 2.3. Prescribed Burning: About 30.8 miles of firebreaks installed at 24 SNAs (including 2 done by CCM) and another 28.1 miles of firebreaks were installed at 35 NPB sites in preparation for prescribed burns; prescribed burns were completed on 2,779 acres at 26 SNAs (involving CCM on burns at 9 sites) and on 1,443 acres at 27 NPB sites (involving CCM on burns at 9 sites). **2.4. Development:** Boundary, entry, and/or rules signs were installed at 24 SNAs (including work done by CCM at 8 sites) and boundary signs were installed at 6 NPB sites (involving CCM on burns at 4 sites); parking areas were constructed at 2 SNAs; 1.8 miles of fence were removed at 1 SNA (done by CCM) and 400 feet of fence removed on 1 NPB; in order to protect rare resources about 1.23 miles of fence was repaired and another 1.3 miles of fence built at 4 SNAs; site cleanup was completed at 5 SNAs and at 1 NPB (by CCM) as part of native plant community restoration and enhancement work. Six interpretive kiosks for 5 SNAs - Lester Lake SNA (Hubbard Co), Minnesota Pine Point SNA (St. Louis County), Bonanza Prairie SNA (Big Stone Co), Pine Bend Bluffs SNA & 2 kiosks at Hastings Sand Coulee SNA (Dakota Co) – were designed, fabricated, & delivered in FY13; most, but not all of the signs have been installed; the remaining interpretive signs will be installed before the end of this calendar year using this appropriation; in addition a new interpretive kiosk frame and a copy of a previously designed interpretive sign were installed at St. Croix Savanna SNA (Washington Co).

2.5. Management Planning: In addition to the management plans originally completed through this fund (see Dec 2011 update above), this appropriation is contributing to the completion 26 plans primarily funded through the 2011 ENRTF appropriation and a matching federal SWG grant. Final results will be pro-rated between the funds. 2.6. Monitoring & AMSD: Baseline pollinator survey work is now underway (with this and the ML2011 ENRTF SNA approp) at 4 SNAs – St Croix Savanna SNA and Lost Valley Prairie SNA (Washington Co), Hastings Sand Coulee SNA (Dakota Co) and Oronoco Prairie SNA (Olmsted Co) – through which species lists of native and nonnative bees are being compiled, bee diversity and abundance is being compared between remnant native prairie and restored prairie areas, and the most effective collection methods are being determined. This appropriation is also contributing to collecting telemetry data on bull snakes at Kellogg-Weaver Dunes SNA (Wabasha Co) to understand their range and behavior and contribute to evaluating adaptive management approaches. Prairie vegetation and bird community monitoring on 2 SNAs - Langhei Prairie SNA (Pope Co) and Prairie Coteau, SNA - is underway to provide native prairie long term status trend information for managed sites to inform management decisions – this is being done in conjunction with the Grassland Monitoring Team including the USFWS and The Nature Conservancy.

Result Status as of March 1, 2014: - CUMULATIVE STATUS since July 1, 2010: 2.1. Plant Community Reconstruction & Rehabilitation: Seed was collected on more 141.1 acres at 9 SNAs and on more than 45.3 acres at 7 NPB sites for prairie reconstruction or rehabilitation projects; collected seed was planted (broadcast or drilled) on 19.9 acres at 4 SNAs and at 40.5 acres at 7 NPB sites along with selective mowing of reconstructed sites. 2.2. Woody Removal & Invasive Species: CCM worked with SNA staff to inventory invasive species across 1804 acres on 18 NPB sites and across 842 acres on 8 SNAs; herbaceous species control activities were completed on 209.8 acres at 28 SNA sites (including CCM work at 5 sites) and 102.4 acres at 26 NPB sites (including CCM work at 6 NPB sites) and woody species control activities were completed on 657.8 acres at 17 SNAs (including CCM work at 5 sites) and on 204.9 acres at 18 NPB sites (including CCM at 9 NPB sites); and 4 invasive species boot brush stands/informational signs were installed at 3 SNAs (1 involving CCM). 2.3. Prescribed Burning: About 31.8 miles of firebreaks installed at 24 SNAs (including 2 done by CCM) and another 28.1 miles of firebreaks were installed at 35 NPB sites in preparation for prescribed burns; prescribed burns were completed on 2,290 acres at 27 SNAs (involving CCM on burns at 9 sites) and on 1,443 acres at 27 NPB sites (involving CCM on burns at 9 sites). **2.4. Development:** Boundary, entry, and/or rules signs were installed at 25 SNAs (including work done by CCM at 8 sites) and boundary signs were installed at 6 NPB sites (involving CCM on burns at 4 sites); parking areas were constructed at 2 SNAs; 1.8 miles of fence were removed at 1 SNA (done by CCM) and 400 feet of fence removed on 1 NPB; in order to protect rare resources about 1.23 miles of fence was repaired and another 1.3 miles of fence built at 4 SNAs; site cleanup was completed at 5 SNAs and at 1 NPB (by CCM) as part of native plant community restoration and enhancement work. Six interpretive kiosks for 5 SNAs – Lester Lake SNA (Hubbard Co), Minnesota Pine Point SNA (St. Louis County), Bonanza Prairie SNA (Big Stone Co), Pine Bend Bluffs SNA & 2 kiosks at Hastings Sand Coulee SNA (Dakota Co) – were designed, fabricated, & delivered in FY13; most, but not all of the signs have been installed; the remaining interpretive signs will be installed before the

end of this calendar year using this appropriation; in addition a new interpretive kiosk frame and a copy of a previously designed interpretive sign were installed at St. Croix Savanna SNA (Washington Co).

**2.5. Management Planning:** Adaptive management plans for 26 SNAs were completed – 1 done by SNA staff (paid completely with this appropriation) and 25 done by 3 contractors with a combination of this appropriation, the federal State Wildlife Grant (SWG), 2010 ENRTF funding and some general fund – as listed below – with significant staff time towards gathering information, directing contractors, and reviewing/revising these plans all funded through this appropriation.

SNA Adaptive Management Plans									
Site Name	SWG \$s	ENRTF ML11	ENRTF ML10	General	Total \$s				
Butternut Valley				2,672	2,672				
Chimney Rock			2,127		2,127				
Clinton Falls Dw Trout Lily			2,419		2,419				
Eagle's Nest		1,486	1,186		2,672				
Englund Ecotone		1,692	1,120		2,812				
Felton Prairie-Bicentennial	3,976				3,976				
Felton Prairie-Assinaboia	2,048				2,048				
Felton Prairie-Shrike	2,038				2,038				
Gustafson's Camp	2,790				2,790				
Holthe Prairie	3,425				3,425				
Iona's Beach		2,820			2,820				
Langhei Prairie		2,124		527	2,651				
Mille Lakes Moraine	3,360				3,360				
Morton Outcrops			2,810		2,810				
Mound Prairie	2,774				2,774				
Mound Spring Prairie	3,325				3,325				
Myhr Creek Ridge				2,790	2,790				
Pembina Trail-Crookston	2,810				2,810				
Pine & Curry Island	2,900				2,900				
Prairie Smoke Dunes	4,125				4,125				
Spring Creek Prairie	2,511				2,511				
St Croix Savanna	2,880				2,880				
Twin Lakes			2,677		2,677				
Wabu Woods				3,028	3,028				
Wolsfeld Woods	1,821				1,821				
TOTAL	40,783	8,122	12,339	9,017	70,261				

- **2.6. Monitoring & AMSD:** In addition to upgrades in usability of the Adaptive Management Spatial Database (AMSD) the following 3 categories of monitoring are being done through this appropriation:
- A. Pollinator Monitoring. Baseline pollinator surveys were completed at 4 SNAs St Croix Savanna SNA and Lost Valley Prairie SNA (Washington Co), Hastings Sand Coulee SNA (Dakota Co) and Oronoco Prairie SNA (Olmsted Co). This survey effort sets the foundation (particularly in testing various sampling techniques) for the pollinator sampling LCCMR project recommended for funding in 006-A Wild Bee Surveys in Prairie-Grassland Habitats. Three of the sites were sampled 6 times each between July Scientific and Natural Areas and Native Prairie Restoration, Enhancement and Acquisition 25

and October 2013 and one site (Lost Valley Prairie SNA) was sampled only 2 times (July and September) due to time constraints imposed by the large size and difficult terrain of the site. Three different trap methods were tested and pollinator abundance and diversity were compared between restored and native prairie locations within each SNA. The majority of specimens have been identified to species and a few difficult to identify specimens await secondary expert corroboration on species determination. Data management is in progress and final analysis is forthcoming. Some preliminary findings/observations are: 1) Honeybees were found at all 4 SNA sites, suggesting that SNAs may help support this agricultural species. 2) Oronoco Prairie SNA seems to have the most diverse community of parasitic bees, which might indicate the healthiest bee community overall. 3) Oronoco Prairie has the highest abundance of bumblebees and ladybugs. 4) Hastings Sand Coulee is largely lacking bumblebees. This site has the most intensive surrounding land uses in terms of potential pesticide use. 5) Anecdotally, the grasshoppers at Hastings Sand Coulee seemed to have the highest load of mites. These mites keep the grasshopper population in check. 6) St. Croix Savanna had the most antlions (which are rare). Elevated pan traps might be a novel method of collecting them. 7) St. Croix Savanna was the only site with the invasive Japanese beetle (Popillia japonica). 8) One trapping method (Blue vane traps) wasn't as effective as anticipated, at least late in the season. A more complete summary of sampling methods is forthcoming.

- **B. Snake Monitoring.** Six bull snakes (2 males; 4 females) were tracked using VHF radio-telemetry during the 2013 field season at Kellogg-Weaver Dunes SNA (Wabasha Co) primarily accomplished through this appropriation. This effort provided valuable information on bull snake habitat use, including nesting and overwintering sites. Prolonged nontraditional habitat use in marshland habitat was documented in some of the snakes.
- C. Native Prairie Monitoring. Native prairie plant community monitoring on 3 Native Prairie Banks SNAs Selix (Pope Co), Agassiz 23 (Lac Qui Parle Co), and Dovray 7 (Murray Co) was completed in summer 2013 to provide native prairie long term status trend information for managed sites to inform management decisions this is being done in conjunction with the Grassland Monitoring Team including the USFWS and The Nature Conservancy. Prairie vegetation and bird community monitoring on 2 SNAs Langhei Prairie SNA (Pope Co) and Prairie Coteau, SNA is underway to provide native prairie long term status trend information for managed sites to inform management decisions this is being done in conjunction with the Grassland Monitoring Team including the USFWS and The Nature Conservancy.

# **Final Report Summary:**

**2.1. Plant Community Reconstruction & Rehabilitation:** Seed was collected on more than 141.1 acres at 9 SNAs and on more than 45.3 acres at 7 NPB sites for prairie reconstruction or rehabilitation projects; collected seed was planted (broadcast or drilled) on <u>27.4</u> acres at 4 SNAs and at 40.5 acres at 7 NPB sites along with selective mowing of reconstructed sites. **2.2. Woody Removal & Invasive Species:** CCM worked with SNA staff to inventory invasive species across 1804 acres on 18 NPB sites and across 842 acres on 8 SNAs; herbaceous species control activities were completed on 209.8 acres at 28 SNA sites (including CCM work at 5 sites) and 102.4 acres at 26 NPB sites (including CCM work at 6 NPB sites) and woody species control activities were completed on 657.8 acres at 17 SNAs (including CCM work at 5 sites) and on

204.9 acres at 18 NPB sites (including CCM at 9 NPB sites); and 4 invasive species boot brush stands/informational signs were installed at 3 SNAs (1 involving CCM). 2.3. Prescribed Burning: About 31.8 miles of firebreaks installed at 24 SNAs (including 2 done by CCM) and another 28.1 miles of firebreaks were installed at 35 NPB sites in preparation for prescribed burns; prescribed burns were completed on 2,290 acres at 27 SNAs (involving CCM on burns at 9 sites) and on 1,443 acres at 27 NPB sites (involving CCM on burns at 9 sites). 2.4. Development: Boundary, entry, and/or rules signs were installed at 25 SNAs (including work done by CCM at 8 sites) and boundary signs were installed at 6 NPB sites (involving CCM on burns at 4 sites); parking areas were constructed at 2 SNAs; 1.8 miles of fence were removed at 1 SNA (done by CCM) and 400 feet of fence removed on 1 NPB; in order to protect rare resources about 1.23 miles of fence was repaired and another 1.3 miles of fence built at 4 SNAs; site cleanup was completed at 5 SNAs and at 1 NPB (by CCM) as part of native plant community restoration and enhancement work. Six interpretive kiosks for 5 SNAs – Lester Lake SNA (Hubbard Co), Minnesota Pine Point SNA (St. Louis County), Bonanza Prairie SNA (Big Stone Co), Pine Bend Bluffs SNA & 2 kiosks at Hastings Sand Coulee SNA (Dakota Co) – were designed, fabricated, & delivered in FY13; most, but not all of the signs have been installed; the remaining interpretive signs will be installed before the end of this calendar year using this appropriation; in addition a new interpretive kiosk frame and a copy of a previously designed interpretive sign were installed at St. Croix Savanna SNA (Washington Co).

**2.5. Management Planning:** Adaptive management plans for 26 SNAs were completed – 1 done by SNA staff (paid completely with this appropriation) and 25 done by 3 contractors with a combination of this appropriation, the federal State Wildlife Grant (SWG), 2010 ENRTF funding and some general fund – as listed below – with significant staff time towards gathering information, directing contractors, and reviewing/revising these plans all funded through this appropriation.

SNA Adaptive Management Plans									
Site Name	SWG \$s	ENRTF ML11	ENRTF ML10	General	Total \$s				
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Iona's Beach		2,820			2,820				
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Mille Lakes Moraine	3,360				3,360				
Morton Outcrops			2,810		2,810				
Mound Prairie	2,774				2,774				
Mound Spring Prairie	3,325				3,325				
Myhr Creek Ridge				2,790	2,790				
Pembina Trail-Crookston	2,810				2,810				

Pine & Curry Island	2,900				2,900
Prairie Smoke Dunes	4,125				4,125
Spring Creek Prairie	2,511				2,511
St Croix Savanna	2,880				2,880
Twin Lakes			2,677		2,677
Wabu Woods				3,028	3,028
Wolsfeld Woods	1,821				1,821
TOTAL	40,783	8,122	12,339	9,017	70,261

- **2.6. Monitoring & AMSD:** In addition to upgrades in usability of the Adaptive Management Spatial Database (AMSD) the following 3 categories of monitoring <u>were</u> done through this appropriation:
- A. Pollinator Monitoring. Baseline pollinator surveys were completed in 2013 at 4 SNAs – St Croix Savanna SNA and Lost Valley Prairie SNA (Washington Co), Hastings Sand Coulee SNA (Dakota Co) and Oronoco Prairie SNA (Olmsted Co); labelling and identification was initiated for 2500 specimens collected. Pollinator specimens were collected in 2014 at 10 SNAs in 8 counties - Compass Prairie (Nobles Co), Lundblad Prairie (Murray Co), Prairie Coteau (Pipestone Co), Glynn Prairie (Lyon Co), Cottonwood River Prairie (Brown Co), Rock Ridge Prairie (Cottonwood Co), Des Moines River (Jackson Co), Holthe Prairie (Jackson Co), Prairie Bush Clover (Jackson Co), and Quarry Park SNA (Stearns Co); about 200 specimens collected are being processed. Development of a pollinator database and creation of DNR's pollinator website were initiated. Bee collections by Odonata (dragonfly) Project volunteers in the peatlands were initiated. Provided technical guidance to incorporate pollinators into DNR's Restore Your Shore, on insect surveys at State Parks, and for the DNR Pollinator BMPs and MDA's Pollinator BMPs for Roadsides. Additional work done during this timeframe was funded as part of the ML11 SNA ENRTF appropriation and results are part of that Final Report.
- **B. Snake Monitoring.** Six bull snakes (2 males; 4 females) were tracked using VHF radio-telemetry during the 2013 field season at Kellogg-Weaver Dunes SNA (Wabasha Co) primarily accomplished through this appropriation. This effort provided valuable information on bull snake habitat use, including nesting and overwintering sites. Prolonged nontraditional habitat use in marshland habitat was documented in some of the snakes.
- **C. Native Prairie Monitoring**. Native prairie plant community monitoring was completed in 2011 on 3 Native Prairie Banks Swedes Forest 20-2 (Redwood Co), Hantho25-1 (Lac Qui Parle Co) and Lund 2 (Douglas Co) and 6 SNAs Blanket Flower (Clay Co), Butternut Valley Prairie (Blue Earth Co), Joseph A Tauer Prairie (Brown Co), Langhei Prairie (Pope Co), Prairie Coteau (Pipestone Co), and Rock Ridge Prairie (Cottonwood Co). Native prairie plant community monitoring was completed in 2013 on 3 Native Prairie Banks SNAs Selix (Pope Co), Agassiz 23 (Lac Qui Parle Co), and Dovray 7 (Murray Co). Bird community monitoring was completed in 2013 on 2 SNAs Langhei Prairie SNA (Pope Co) and Prairie Coteau, SNA. This monitoring (being done in conjunction with the Grassland Monitoring Team including the USFWS and The Nature Conservancy) provides native prairie long term status trend information for managed sites to inform management decisions.

#### **RESULT/ACTIVITY 3: Native Prairie Landowner Assistance & Incentives**

**Description:** At one time, native prairie occupied 18,000,000 acres in Minnesota. Today, less than one percent (about 170,000 acres) of Minnesota's native prairie remains, and nearly 95,000 acres remains in private ownership. Thus, the future of native prairie conservation is dependent upon engaging its private landowners through a suite of native prairie conservation incentives and assistance tools. This result continues and expands the ENRTF-supported accelerated prairie stewardship work to assist private landowners through management consultation, information, delivery of prairie stewardship plans, and increasing participation in the Prairie Tax Exemption (PTE) Program. This work directly implements Habitat Recommendation 13 (Habitat and landscape conservation and training programs for all citizens) of the SCPP and a SWAP's priority conservation action (provide technical assistance to interested individuals and organizations).

Specifically, this result focuses on four key tools to gain private landowner participation in conserving their native prairie. Six prairie management workshops-field days and new outreach materials for private landowners will be developed and delivered. This includes partnering with other technical assistance providers to assure they are delivering consistent native prairie conservation messages. DNR staff will meet with at least 40 landowners to listen to their goals, examine their property, and provide technical consultation on how to best manage their prairie. At least 30 landowners will receive a contractor or staff-prepared comprehensive prairie stewardship plan, including an evaluation their prairie's condition, identification of management needs, and recommendations for management action. In addition, about 90 native prairie landowners will be contacted and site visits conducted by contractor or staff to enroll or recertify them in the PTE program. Note: neither participating landowners nor PTE counties receive any payments under this Result; funds are for contractors or staff to work with landowners.

**Summary Budget Information for Result/Activity 3:** 

ENRTF Budget: \$170,075 Amount Spent: \$170,075 Balance: \$0

**WORK PROGRAM AMENDMENT APPROVED on January 10, 2013** to move the remaining \$216,725 balance under this Result to Results 1 and 2.

Deliverable/Outcome	Completion	Budget
	Date	
1. 6 workshops-field days & outreach mtls. delivered	6/30/2013	\$37,700
to prairie landowners (& other asst. providers)		
2. consultations, guidance, mgmt asst, etc to 40	6/30/2013	\$75,500
landowners		
3. stewardship plans provided to 30 landowners	6/30/2013	\$188,700
4. ~90 landowners enrolled or recertified in Prairie	6/30/2013	\$84,900
Tax		

**Result Completion Date:** 6/30/2013 (the intention is to complete all this work by 6/30/2012)

Result Status as of December 20, 2010: 3.1. Outreach: staff are indentifying opportunities, priorities, and target audiences. 3.2. Technical Assistance: To date, SNA staff have provided substantive technical assistance 13 native prairie landowners. 3.3. Stewardship Plans: one staff-prepared plan is underway; an RFP is about to be issued to solicit proposals for another 30 to 35 stewardship plans. It is anticipated that contracts will be awarded and contractors will be on-the-ground before spring. 3.4. Prairie Tax Exemption. Due to a critical prairie specialist position vacancy, progress on PTE has been minimal – primarily limited to fielding questions and some data management. It is anticipated that field evaluations for the new enrollment and recertification process will begin in the spring.

Result Status as of May 5, 2011: Outreach: one landowner workshop was held in Chandler attended by 9 landowners (half current NPB landowners and some owners of very high priority prairie sites identified by MCBS as a result of a direct mailing). 3.2. Technical Assistance: Since July 1, SNA staff have provided substantive technical assistance 21 native prairie landowners. 3.3. Stewardship Plans: one staff-prepared plan is underway; bids/proposal are being received in response to an RFP to contract to do another 30 to 35 stewardship plans plus any eligible associated conservation easement baseline reports (combining the plans and baselines adds efficiency and saves cost, but is a new procedure for the state so it delayed the RFP). 3.4. Prairie Tax Exemption: Activities to date include: some landowner contacts and site investigation, communications with county assessor offices, and preparing for mailing to targeted current enrollees.

Result Status as of December 1, 2011 – CUMULATIVE STATUS since July 1, 2010: 3.1. Outreach: one landowner workshop was held in Chandler attended by 9 landowners (half current NPB landowners and some owners of very high priority prairie sites identified by MCBS as a result of a direct mailing). Prairie Ecology presentations were also give to over 335 5th and 6th grade students and teachers during a 2-day Environmental Fair in Marshall, MN. Students participated in a "Build Your Own Prairie" exercise allowed then to use their deductive reasoning skills to design their own prairie restoration. 3.2. Technical Assistance: SNA prairie specialists have met with 37 individual native prairie landowners and provided technical consultation on how to best manage their prairies, and offer possible prairie protection options. 3.3. Stewardship Plans: SNA prairie specialists have written Prairie Stewardship Plans for the Carson 5 NPB (prairie bush-clover site) and the in-progress Lake Benton 19-1 NPB (soon to be the first NPB in Lincoln County). Competitive contracts have also been awarded to 3 professional consultants who are in the process of completing 35 prairie stewardship plans. 3.4. Prairie Tax Exemption: Nearly half (~250) of the tracts currently enrolled in Prairie Tax Exemption (PTE) have been reviewed and screened for re-enrollment. 55 landowners have received letters requesting that they re-enroll in PTE, of which 13 have already re-enrolled. At least another 50 landowner letters are scheduled to be mailed out before spring.

Result Status as of April 27, 2012: - CUMULATIVE STATUS since July 1, 2010:

- **3.1.Outreach:** one landowner workshop was held in Chandler attended by 9 landowners (half current NPB landowners and some owners of very high priority prairie sites identified by MCBS as a result of a direct mailing). Prairie Ecology presentations were also give to over 335 5th and 6th grade students and teachers during a 2-day Environmental Fair in Marshall, MN. Students participated in a "Build Your Own Prairie" exercise allowed then to use their deductive reasoning skills to design their own prairie restoration. Three Private Land Practitioner forums (Owatonna, Montevideo, and Windom) were conducted to instruct other private land specialists about the stewardship options available to prairie landowners. The forums targeted private land specialists from SWCD, BWSR, USFWS, and NRCS.
- **3.2. Technical Assistance:** SNA prairie specialists have met with 40 individual native prairie landowners and provided technical consultation on how to best manage their prairies, and offer possible prairie protection options.
- **3.3. Stewardship Plans:** SNA prairie specialists have written Prairie Stewardship Plans for the Carson 5 NPB (prairie bush-clover site) and the in progress Lake Benton 19-1 NPB (soon to be the first NPB in Lincoln County). Competitive contracts have also been awarded to 3 professional consultants who are in the process of completing 35 prairie stewardship plans (scheduled to be completed by June 15<sup>th</sup>).
- **3.4. Prairie Tax Exemption:** Nearly half (~250) of the tracts currently enrolled in Prairie Tax Exemption (PTE) have been reviewed and screened for re-enrollment. In 2011 letters were sent to 55 landowners requesting that they re-enroll in PTE, of which 26 have re-enrolled. Another 50 landowners just received letters requesting re-enrollment and evaluation of those new applications is expected to begin in May.

# Result Status as of October 31, 2012: - CUMULATIVE STATUS since July 1, 2010:

- **3.1. Outreach:** A conservation grazing workshop was held for Redwood and Cottonwood County landowners; information was presented on how to incorporate prairie conservation goals into their grazing operations. One landowner workshop was held in Chandler attended by 9 landowners (half current NPB landowners and some owners of very high priority prairie sites identified by MCBS as a result of a direct mailing). Prairie Ecology presentations were also give to over 335 5th and 6th grade students and teachers during a 2-day Environmental Fair in Marshall, MN. Students participated in a "Build Your Own Prairie" exercise allowed then to use their deductive reasoning skills to design their own prairie restoration. Three Private Land Practitioner forums (Owatonna, Montevideo, and Windom) were conducted to instruct other private land specialists about the stewardship options available to prairie landowners. The forums targeted private land specialists from SWCD, BWSR, USFWS, and NRCS. The "Prairie Treasure: A Native Prairie Bank Story" DVD was reprinted (2000 copies) and distributed to landowners events.
- **3.2. Technical Assistance:** SNA prairie specialists have met with 75 individual native prairie landowners and provided technical consultation on how to best manage their prairies, and offer possible prairie protection options. Less actual time was spent on this deliverable because the prairie stewardship specialist position in the DNR Northwest Region is vacant since spring 2011.
- **3.3. Stewardship Plans:** SNA prairie specialists have written Prairie Stewardship Plans for the Carson 5 NPB (prairie bush-clover site) and the recently acquired Lake Benton 19-1 NPB. Competitive contracts were awarded to 3 professional consultants who have completed 36 prairie stewardship plans. These plans have been reviewed and

presented to the landowners. The competitive bid contracts came in under the estimated cost, leaving funds unspent in this deliverable which are proposed to be moved to other results.

**3.4. Prairie Tax Exemption:** All 500 Prairie Tax Exemption (PTE) tracts have been reviewed and screened for re-enrollment. Letters and application forms were sent to 250 prairie landowners, requesting that they return application materials by May. To date, 30 applications have been received back from landowners and processed with this appropriation; additional applications are being processed using the 2011 ENRTF appropriation. Initial costs for reviewing and screening PTE records and sending large mailings has been less than expected. Other DNR staff members, such as Area Wildlife Managers, have also contributed to the processing of applications and performing site evaluations, reducing SNA Program costs. Subsequently, some funds have been left unspent in this deliverable and are proposed to be moved to the other results.

**Result Status as of March 15, 2013:** This result was completed prior to the last report – see October 2012 status report above.

# **Final Report Summary:**

- 3.1. Outreach: A conservation grazing workshop was held for Redwood and Cottonwood County landowners; information was presented on how to incorporate prairie conservation goals into their grazing operations. One landowner workshop was held in Chandler attended by 9 landowners (half current NPB landowners and some owners of very high priority prairie sites identified by MCBS as a result of a direct mailing). Prairie Ecology presentations were also give to over 335 5th and 6th grade students and teachers during a 2-day Environmental Fair in Marshall, MN. Students participated in a "Build Your Own Prairie" exercise allowed then to use their deductive reasoning skills to design their own prairie restoration. Three Private Land Practitioner forums (Owatonna, Montevideo, and Windom) were conducted to instruct other private land specialists about the stewardship options available to prairie landowners. The forums targeted private land specialists from SWCD, BWSR, USFWS, and NRCS. The "Prairie Treasure: A Native Prairie Bank Story" DVD was reprinted (2000 copies) and distributed to landowners events.
- **3.2. Technical Assistance:** SNA prairie specialists met with 75 individual native prairie landowners and provided technical consultation on how to best manage their prairies, and offer possible prairie protection options. Less actual time was spent on this deliverable because the prairie stewardship specialist position in the DNR Northwest Region was vacant when this Activity was being completed.
- **3.3. Stewardship Plans:** SNA prairie specialists have written Prairie Stewardship Plans for the Carson 5 NPB (prairie bush-clover site) and the recently acquired Lake Benton 19-1 NPB. Competitive contracts were awarded to 3 professional consultants who have completed 36 prairie stewardship plans. These plans were reviewed and presented to the landowners. The competitive bid contracts came in under the estimated cost, leaving funds unspent in this deliverable which were moved to other results.

County	Site Name	Prairie Acres	Prepared by
Cottonwood	Carson 5	40	SNA staff
Lincoln	Lake Benton 19-1	134	SNA staff

Clay	Begg Prairie	238	Contractor
Clay	Spillum Prairie	40	Contractor
	•		
Ottertail	Cullen Prairie	25	Contractor
Polk	Benoit Prairie	100	Contractor
Polk County	Weber Prairie	24	Contractor
Pope	Blue Mound 15-1	50	Contractor
Pope	Lake Johanna 31-1	50	Contractor
Pope	Rolling Forks 3-1	154	Contractor
Pope	Blue Mound 10-1	300	Contractor
Traverse	Drinkwitz Prairie	80	Contractor
Traverse	Schmitz Prairie	200	Contractor
Fillmore	Rushford 3-1	41	Contractor
Houston	Hokah 25-1	32	Contractor
Big Stone	Akron 31-1	71	Contractor
Big Stone	Akron 11-1	179	Contractor
Big Stone	Akron 13-1	63	Contractor
Big Stone	Odessa 36-1	116	Contractor
Brown	Mulligan 18	143	Contractor
Cottonwood	Storden 4-2	18	Contractor
			_
Cottonwood	Ann 25	24	Contractor
	D	0.5	0 1 1
Jackson	Petersburg 26	95	Contractor
laakaan	Deterohuma 22	<b>-</b> 7	Cantractor
Jackson	Petersburg 33	57	Contractor
Jackson	Belmont 5	40	Contractor
Jackson	Beimont 5	40	Contractor
Jackson	Christiana 31 A	42	Contractor
Jackson	Officialia 31 A	72	Contractor
Jackson	Christiana 31 B	12	Contractor
Kandiyohi	Ellingson Prairie	125	Contractor
Trainary of it	Limigeon France	120	Contractor
Lincoln	Fiefarek Prairie	20	Contractor
			<b></b>
Lyon	Clifton 32-1	17	Contractor
Lyon	Custer 15	62	Contractor
Mower	Brownlow Prairie	50	Contractor
Mower	Rieken Prairie	6	Contractor
Murray	Holly 17	33	Contractor
			2 2 40.01
Murray	Pilligard Prairie	25	Contractor
,	<u> </u>	-	
Redwood	Johnsonville 30	21	Contractor
	•		

Rice	Northfield 25-1	136	Contractor
Wilkin	Stetz Prairie	64	Contractor

**3.4. Prairie Tax Exemption:** All 500 Prairie Tax Exemption (PTE) tracts have been reviewed and screened for re-enrollment. Letters and application forms were sent to 250 prairie landowners. Thirty applications were received back from landowners and processed with this appropriation; additional applications were processed using the 2011 ENRTF appropriation. Initial costs for reviewing and screening PTE records and sending large mailings has been less than expected. Other DNR staff members, such as Area Wildlife Managers, have also contributed to the processing of applications and performing site evaluations, reducing SNA Program costs.

#### V. TOTAL ENRTF PROJECT BUDGET:

**WORK PROGRAM AMENDMENT APPROVED on December 22, 2011** – to move in Result 1 \$1600 from salary to printing & in Result 2 \$20,000 from salary to travel & fleet (to cover increased woody removal and prescribed burn equipment operation costs; also to move equipment fleet charges from equipment/tools category to travel category to reflect how charges are grouped in SWIFT.

# **WORK PROGRAM AMENDMENT APPROVED on January 10, 2013.**

Result 1 - increased the budget by \$73,665 up to \$597,265; with the "Personnel" category increase to \$50,000, the "Contracts-Professional/Technical" category reduced to \$5,000, the "Land Acquisition" category increased to \$380,000, "Professional Services for Acquisition" category increased to \$85,000 and the "Supplies" category reduced to zero. Result 2 - increased the budget by \$143,060 up to \$982,660; with the "Personnel" category increase to \$515,000, the "Contracts-other" category increased to \$248,000, the "Printing" category reduced to zero, the "Supplies" category increased to \$49,960, the "Travel Expense in Minnesota" category increased to \$70,000 and the "Other" category reduced to \$32,700. Result 3 – decreased the budget by \$216,725 down to \$170,075 with resulting \$0 balance; with the "Personnel" category reduced to \$62,205, the "Contracts-Professional/Technical" category reduced to \$101,515, the 'Printing" category reduced to \$2,705, the "Supplies" category reduced to \$569, the "Travel Expenses in Minnesota" category reduced to \$3,006 and the "Other" category reduced to \$75.

# WORK PROGRAM AMENDMENT APPROVED on March 26, 2013.

\$25,000 from Result 1 to Result 2 (*Note: this is a portion of the amount approved to be moved from Result 3 to Result 1 in January*); **reduce:** land acquisition (landowner payments) by \$25,000, professional services for acquisition by \$5,000, and supplies (Result 2) by \$12,400; and **increase:** personnel by \$7,400 (\$5K for Result 1 and \$2.4K for Result 2 – *much less than the personnel reduction approved in January*) and other contracts (for woody removal project) by \$35,000.

WORK PROGRAM AMENDMENT APPROVED on September 5, 2013.

The changes requested are what are needed to complete acquisition, monitoring, and final interpretive sign installation; it includes moving some funds back into personnel necessary to extend implementation of these activities into the 4<sup>th</sup> year and also because the pollinator and snake monitoring is being done by unclassified staff rather than contractors in order to utilize the best expertise available.

# WORK PROGRAM AMENDMENT APPROVED by LCCMR on December 13, 2013.

The changes requested are additional adjustments needed to complete acquisition, monitoring, and final interpretive sign installation; it includes moving some funds back into personnel to extend implementation of these activities into the 4<sup>th</sup> year, including a pair of acquisitions requiring more staff time than anticipated.

# WORK PROGRAM AMENDMENT APPROVED by LCCMR on March 4, 2014.

The changes requested are additional adjustments needed to complete acquisition, and monitoring; it includes moving some funds back into personnel because acquisitions are requiring more staff time than anticipated and because some monitoring (e.g. pollinator work) is being done by MBS instead of by contractors; also some work by MNIT on AMSD will not be able to be done this FY.

WORK PROGRAM AMENDMENT REQUESTED on August 15, 2014 to move \$6,884 from Result 2 back to Result 1 – due to increased acquisition expenses and reduced need in FY14 for Result 2 monitoring funds. It includes moving some funds for personnel from Result 2 back to Result 1 and moving some funds to acquisition professional services in Result 1; increasing funds for contracts for monitoring and to complete payments on previously done management plans; reducing amounts for supplies and travel in Result 2, slightly increasing the amount for travel in Result 1, and reducing the amount for printing. The additional costs in Result 1 were due to efforts to try to resolve acquisition-related issues on the St. Wendel projects.

APPROVED: 08/21/2014

**Personnel**: \$675,245– classified & unclassified specialists & technicians paid almost exclusively with special project funds (3.5 FTEs); classified project & contract coordinator (new function - 0.4 FTE); and project crews (laborers and seasonal burn crew 2.57 FTEs). *Note: this change is still under the \$796,400 for personnel in the original approved work program; all these FTEs are for two years only – since the work extends into the 4th year of the appropriation, FTEs are lower for those deliverables. Contracts: \$438,545– to be selected through state bid process, for deliverables including: NPB baseline property reports & monitoring (~\$23K); interpretive signs and other site development (~\$4.5K); SNA adaptive management plans (~\$12.5K); adaptive management monitoring (~\$50K); outreach materials development (~\$3K); private prairie stewardship plans (~\$112K); prairie tax exemption certification and enrollment (~\$19K); native habitat reconstruction (~\$22K); woody encroachment removal & exotics control (~\$75K); and prescribed burning (~\$100K).* 

**Tools/Supplies/Printing**: \$43,534– parts, repair costs & supplies for restoration & enhancement (~\$35.5K); interpretive signs, other signs, fences, etc (~\$14.5K); workshops (~\$0.6K); printing (~\$4.7K). Note: fabrication of the interpretive signs included a \$3771 charge for "printing" them, rather than as supplies.

**Acquisition (Fee Title or Permanent Easements):** \$497,506 – with fee and easement to be held by the DNR and administered by the SNA Program.

**Travel & Fleet Charges:** \$74,612– instate for field work (~\$8.5K); fleet charges for trucks, cars, & equipment (~\$66.6K). Note: moving fleet charges here from above is to reflect SWIFT changes which combine them in financial reports.

**Additional Budget Items:** \$20,548 – landowner costshare for restoration work (\$6.3K); DNR MIS charges for database development (\$25.6K); for Result 2 work: seed testing, training fees & disposal fees (\$800); for Result 3 work: facilities rental for landowner workshops (\$75).

**TOTAL ENRTF PROJECT BUDGET: \$1,750,000 Explanation of Capital Expenditures Greater Than \$3,500**: NA

# **VI. PROJECT STRATEGY:**

**A. Project Partners:** The SNA program staff are primarily responsible for this work. Other Divisions, conservation groups, and NGOs will be involved where appropriate to achieve mutual project aims – including Metro Conservation Corridor partners, The Nature Conservancy, STS, and MCC. No funding through this appropriation is earmarked to go to partners. However, they may bid for and receive contracts with us through normal DNR bidding procedures.

**B. Project Impact and Long-term Strategy:** This project will help protect and perpetuate rare species, SGCNs, and natural features of state significance across the state selected because of their importance and strategic value. As a part of the State Outdoor Recreation system, SNA sites promote public access and opportunities to the public for nature observation and study. NPBs also allow for public access.

The SNA Long Range Plan has a goal of protection through SNA designation within each ecological subsection of five occurrences of each native plant community (NPC) and three occurrences of each natural heritage element found in that subsection. This plan identifies a substantial need for more SNA land acquisition and native habitat restoration/development for at least the next 2 decades. In addition, through either NPB or SNA, the Division's goal is to permanently protect an additional 30,000 acres of sites with high or outstanding quality native prairie. Both NPB and SNA are starting implementation of adaptive management which requires ecological monitoring of managed sites to continuously inform and improve methods. Towards this end, the Division could readily utilize support from the Environment and Natural Resources Trust fund of \$8M to \$12M per biennium over the next 20 years.

# C. Other Funds Proposed to be Spent during the Project Period:

An estimated \$26,500 inkind directly related to this project (e.g. general fund-supported project manager and Prairie Biologist staff time; and volunteers and STS service) is expected to be contributed to this project (but not tracked for reporting purposes). Approximately \$245,000 in Department Operations and Division Support charges accruing to this project will be covered by Division general funds and other eligible Division funds. (See Attachment B.)

In addition, this Environment and Natural Resource Trust Fund appropriation will be supplemented by other state funding (e.g. bonding and potentially L-SOHC, invasives

species, heritage enhancement, and RIM match) and non-state funds (e.g. federal SWG, private funds, and partial landowner donations) as needed to complete priority acquisitions and do additional restoration, development, and prairie stewardship work during this project time frame. This additional funding is to accomplish acres, etc. not included in the deliverables listed in this work program. Other funding sources and amounts used towards completing this appropriation's acquisition projects will be listed and acreages pro-rated in acquisition project reports and work program updates.

# D. Spending History:

LCCMR appropriations FY 2005-2009 (not including Habitat Corridors Partnership – which is in separate LCCMR work program): FY 2005 SNA Statewide \$134K – ML 2005, 1st Spec. Sess., Chap. 1, Art. 2, Sec. 11, Subd. 5(c); 2005 Prairie Stewardship \$100K – ML 2005, 1st Spec. Sess., Chap. 1 Art. 2, Sec. 11, Subd. 05(d); 2005 SNA Metro Corridors \$300K – ML 2005, 1st Spec. Sess., Chap. 1, Art. 2, Sec. 11, Subd.5(b); 2007 Prairie Stewardship \$220K – ML 2007, Chap. 30, Sec.2, Subd.4(d); 2007 SNA Metro Corridors \$243K – ML 2007, Chap. 30, Sec. 2, Subd. 4(c); 2008 SNA Statewide \$1M – ML 2008, Chap. Chap. 367, Sec. 2, Subd. 3(f); 2008 SNA Metro Corridors \$515K – ML 2008, Chap. 367, Sec. 2, Subd. 3(a); Accelerated Prairie (Results 3,4 & 6 only) \$975K – ML 2008, Chap. 367, Sec. 2, Subd. 3(m); 2009 SNA Statewide \$590K – ML 2009, Chap. 143, Sec. 2, Subd. 4(d); and 2009 SNA Metro Corridors \$410K – ML 2009, Chap. 143, Sec. 2, Subd. 4(f).

Other State appropriations FY06-10 for SNA program PROJECT work: annual appropriations of Heritage Enhancement ~ \$100K/year; 2007 RIM Match \$78K; 2009-10 RIM Match \$62K; 2009 Remediation grant \$120K; 2009-10 BWSR Native Buffer grant \$46.768K; 2009-09 Invasives Species grant \$80K; 2010 Invasives Species grant \$100K; 2006 bonding SNA \$2M; 2006 bonding Native Prairie Bank \$1M; 2008 SNA bonding \$1M; and 2008 Native Prairie bonding \$4M.

Non-state funding FY06-10. Federal funds spent to date (11/23/09) in FY06-10: State Wildlife Grants for SNA work \$135.6K and for monitoring \$109.6K; Landowner Incentive Program – Native Prairie \$839.5K; and LAWCON \$384K. Other funds spent: The Conservation Fund (Doris Duke) \$38K; Dakota County \$566K; and other partner contributions and landowner donations.

**VII. DISSEMINATION**: SNA in cooperation with its partners will issue a press release and/or publicize a dedication event for each fee acquisition completed through this project and for each workshop held through this appropriation.

**VIII. REPORTING REQUIREMENTS:** Periodic work program progress reports will be submitted not later than September 1 and March 1 of each year, starting September 1, 2010. A final work program report and associated products will be submitted between June 30 and August 1, 2014 as requested by the LCCMR.

# IX. RESEARCH PROJECTS: NA

Final Attachment A: Budget Detail for 2010 Pro	ojects											
Project Title: SNA & Native Prairie Res	storation, Enhance	ement & Aco	quisition									
Project Manager Name: Margaret (Peggy) Boot	 h 											
Trust Fund Appropriation: \$1,750,000												
	RESULT 1 REVISED			RESULT 2 REVISED			RESULT 3 REVISED			REVISED TOTAL BU		
2010 Trust Fund Budget	Result 1 Budget:	Amount Spent	Balance	Result 2 Budget:	Amount Spent	Balance	Result 3 Budget:	Amount Spent	Balance	TOTAL BUDGET	TOTAL SPENT	TOTAL BALANCE
	Protection			Restoration & Enhancement			Landowner Assistance					
BUDGET ITEM												
PERSONNEL: wages and benefits classified & unclassified specialists & technicians paid almost exclusively with special project funds (3.58 FTEs); classified project & contract coordinator (new function - 0.48 FTE); and project crews (laborers and seasonal burn crew 2.57 FTEs)	63,514	63,514	0	549,526	549,526	(	62,205	62,205	0	675,245	675,245	0
Professional/technical Contractors (to be selected through state bid process) for deliverables including NPB baseline property reports & monitoring (~\$23K); interpretive signs and other site development (~\$4.5K); SNA adaptive management plans (~\$12.5K); adaptive management monitoring (~\$50K); outreach materials development (~\$3K); private prairie stewardship plans (~\$112K); and prairie tax exemption certification and enrollment (~\$19K)	5,000	5,000	0	66,183	66,183	(	101,515	101,515	0	172,698	172,698	0
Other contracts (to be selected through state bid process) for deliverables including native habitat reconstruction (~\$22K), woody encroachment removal & exotics control (~\$75K), and rescribed burning (~\$100K)	0	0	0	265,847	265,847	(	0	0	0	265,847	265,847	0
Land acquisition	351,236	350,968	268			(	0		0	351,236	350,968	268
Easement acquisition	73,165	73,165				(	0		0	73,165	73,165	0
Professional Services for Acq. (including LAM transaction and survey charges, attorney general charges, title work charges, abstracts, filing fees, deed tax, etc)	73,105	73,105	0			(			0	73,105	73,105	0
Printing & reproduction of DVDs	1,614	1,614	0	3,771		(	2,705			8,090	8,090	0
Supplies parts, repair costs & supplies for restoration & enhancement (~8.4\$K); interpretive signs, other signs, fences, etc (~\$14.8K); and workshops (~\$1.2K)  Travel expenses in Minnesota (\$8.5K) & Fleet charges for trucks, cars & equipment (~\$50.4K)	2,050	2,050	0	34,875 69,556	·	(	3,006			74,612	74,612	0
Other landowner costshare for restoration work (\$25 6.3K); and DNR MIS charges for database development (\$17 25.6K); seed testing, training fees, & disposal (\$800); facilities rental for landowner workshops (\$400-75K)	0	0	0	20,473	20,473	(	75	75	0	20,548	20,548	0
COLUMN TOTAL	\$569,684	\$569,416	\$268	\$1,010,231	\$1,010,231	\$(	\$170,075	\$170,075	\$0	\$1,749,990	\$1,749,722	\$268

# Table 1. 2010 LCCMR: Targeted Sites for Potential SNA or NPB Acquisition

Final Report 8-15-14

This priority list identifies potential project areas for DNR's Scientific and Natural Areas Program. If SNA & Native Prairie Bank conservation easement (NPB) acquisition opportunities arise that have been identified as high-quality parcels, DNR may include these opportunities on the priority list. More than 1 NPB may be acquired in each of the areas identified below.

active or completed project areas in BOLD: changes underlined

	active or completed project areas in <b>BOLD</b> ;							
Location Name	County	Proposed SNA Addition	Proposed New SNA	Proposed NPB	Estimated Acres	Ecological Features (primary)	Project Status	
Avon Hills Forest	Stearns	1			160	mesic oak forest	Acquisition of a 30-acre site has access issues so is no longer being pursued.	
Badoura Jack Pine	Hubbard		1		900	jack pine forest & prairie	Acquired in 2 phases; Phase 1 acquired in part through this appropriation.	
Big Stone Moraine Prairie / Correll Working Lands Area	Big Stone			1	80	mesic to dry prairie	Two NPB acquisitions completed in March 2011 totalling 72.6 acres.	
Big Woods of Cottonwood R	Lyon		1		200	snow trillium, mesic forest, sedge meadow, prairie	Being considered for other funding.	
Blanket Flower	Clay	1			80	dry prairie	Acquisition closed in November 2011 of 136-acre paid in part with this funding.	
Brownsville	Houston		1		300	Mississippi River bluffs with oak forest supporting rare snake.	Acquisition being pursued with future funding.	
Cedar Mountain	Redwood	1			80	rock outcrop, prairie, oak woodland; igneous rock intrusion	Primary landowner turned down acquisition through Green Corridors; others have rock outcrop easements.	
Chanarambie Creek	Murray		1	1	180	dry prairie	Being considered for other funding.	
Chester Hills	Polk		1		800	wetland, prairie	No current projects.	
Cooks Lake Forest	Ottertail & Becker		1		360	mesic hardwood forest, undeveveloped lakeshore	No current projects.	
Dinner Creek - Phase II	Becker & Hubbard		1		560	forest-wetland complex, including jack pine woodland, white cedar swamp	No current projects.	
Englund Ecotone	Benton	1			680	oak forest, savanna, sedge meadow	Acquisitions at the site were rejected by the landowners.	
Felton Prairie	Clay	1			200	prairie complex with sand- gravel prairie on beach ridge	Offer on current project through bonding rejected by landowner; other project considered with other funding.	
Franconia Bluffs	Chisago	1			300	forested bluff-floodplain complex along St. Croix R.	No current projects.	
Goodhue Bluffs - Phase II	Goodhue		1		600	forested bluff-floodplain, lower Vermillion R frontage; overlook Mississippi R; is IBA	Landowner asked for project to be deferred a few years.	
Hastings Sand Coulee	Dakota	1			100	dry and-gravel prairie, oak savanna, rare species	Projects moved 2009 ENRTF funding.	
Hovland Woods	Cook	1			640	upland white cedar, northern hardwood forest	Current project acquired through bonding; other lands are School Trust lands & not available for buyout now.	
Lac Que Parle Prairie	Lac Que Parle			1	300	mesic to dry prairie	Being considered for other funding.	
LaSalle Lake - Phase I	Hubbard		1		700	Mississippi R frontage; glacial tunnel valley; deep lake; Ram's head orchid; native forest (upland & lowland conifer & hardwoods; cedar swamp)	Acquired with other funding.	
Little Kandiyohi-Wakanda Lakes Peninsula Forest	Kandiyohi		1		240	wet mesic hardwood forest; rock elm, kentucky coffeetree	Being considered for other funding through TPL.	
Lost Forty	Itasca	1			10	pine forest, wetland	No current project.	

Mille Lacs Upland	Crow Wing		1		580	mesic hardwood forest	Acquisition of a 319-acre parcel closed in June 2012 paid in part with this appropriation; 2nd offer made on 2nd parcel was rejected by landowner.
Mission Creek/Magney- Snivley (tentative)	St. Louis		1	1	1800	northern hardwood forest	Federal grant not received; project postponed.
Morton Outcrops	Renville		1		65	bedrock knob, mesic prairie	No current project; priority for Green Corridor.
Nopeming Unconformity	St. Louis		1		100	geological feature, northern hardwood forest	No current project.
Partch Woods	Stearns	1			80*	oak savanna-woodland, tamarack bog & sedge meadow	Land sold to other private landowner; not currently available
Pine Bend Bluffs	Dakota	1			40	Mississippi R frontage, mesic oak forest	Primary acquisitions completed with other funding.
Pipestone Quartzite Outcrops	Pipestone		1		315	bedrock outcrop with rare plants	No current project.
Prairie Coteau	Pipestone	1			200	southwestern dry hill prairie & dry sand-gravel prairie	No current project
Redwood Fen	Redwood		1		150	calcareous fen, prairie	Considered through Green Corridor.
Root River Valley (proposed Rushford Bluffs SNA)	Fillmore		1		150	oak-shagbark hickory woodland, bluff prairie	Landowner turned down offer for 52-acre acquisition.
Savage Fen	Scott	1			100	calcareous fen, forested bluff	Acquisition completed in Nov. 2010 paid in part with this appropriation; no further acquisitions proposed at this time.
Seminary Fen	Carver	1			100	calcareous fen, forested bluff	Landowner rejected offer; no longer proposed for this \$.
St Wendel Tamarack Bog	Stearns	1			500	tamarack bog & adjoining maple-basswood forest	The 10-acre acquisition closed in October 2011; 12-acre parcel in private ownership acquired in June 2014; other acquisitions not completed.
Swedes Forest	Redwood	1			360	bedrock knobs with rare plants, five-lined skinks	Considered through Green Corridor.
Twin Lakes	Isanti		1		500	wetland-forest-shallow lake complex	No current project
Two Rivers Aspen Parklands	Roseau	1			610	apsen woodland, shrubby wet meadow, brush prairie	No current project
Watrous Island	Koochiching		1		70	island in Rainy R; floodplain forest	Being acquired with OHF.
Wykoff Balsam Fir	Fillmore	1			38	mesic hardwood forest, algific talus slope, trout stream	Fee owner of existing SNA conservation easement (originally received through donation) is interested in bargain sale of fee to DNR - no use of this appropriation is currently proposed
Yellow Medicine Coteau	Yel. Medicine	1		1	180	dry hill prairie, prairie meadow, wet prairie, rare species	Acquired with OHF.