

Request for Funding

Lessard-Sams Outdoor Heritage Council Fiscal Year 2016 / ML 2015

Program or Project Title: Southeast forest habitat enhancement

Funds Requested: \$949,000

Manager's Name: Bryan Lueth
Title: Forest Wildlife Habitat Leader
Organization: MN DNR Wildlife
Street Address: 500 Lafayette Rd
City: St. Paul, MN 55155-4020
Telephone: 651-259-5190
E-Mail: bryan.lueth@state.mn.us
Organization Web Site: dnr.state.mn.us

County Locations: Fillmore, Goodhue, Houston, Olmsted, Wabasha, and Winona.

Ecological Planning Regions:

- Southeast Forest

Activity Type:

- Enhance

Priority Resources Addressed by Activity:

- Forest

Abstract:

Blufflands forest habitat is threatened by invasive species and succession to less desirable northern hardwoods. This project combines pre-harvest invasive species removal and mast-producing hardwood tree planting and post-harvest release.

Design and Scope of Work:

Many forest stands in Southeast MN are losing their hard mast component and converting to less desirable northern hardwoods, such as maple-basswood. Non-native species such as buckthorn and honeysuckle are also invading these stands. Oak and other mast-producing species are difficult to regenerate naturally, especially with the advanced age of many of these stands (65% of stands are over normal rotation age), so augmenting regeneration through invasive species removal and planting is required for success. Additionally, it is beneficial to conduct stand improvement activities in recently established stands to improve the stand's mast-producing species composition and condition by removing undesirable competing species, allowing favored species room to grow. Benefits to wildlife include promoting desirable species establishment and growth that also increase mast production of remaining trees, resulting in diverse forests that provide habitat and hard mast food sources for a variety of wildlife. Creating and managing younger stands will help to address age-class imbalances, and create more resilient stands to withstand threats such as insects, disease, and climate change. Stands will be selected for planting from the pool of stands on the annual stand exam list from the Blufflands/Rochester Plateau Section Forest Resource Management Plan that include the Whitewater Wildlife Management Area, Rochester Area State Wildlife Management Areas, and Richard J. Dorer Memorial Hardwood State Forest. Stands selected for release will be identified from regeneration checks of stands harvested within the past 10-15 years. This project will receive financial support (\$5,000/yr. for 4 years) from both the National Wild Turkey Federation and the Minnesota Deer Hunters Association.

How the request addresses MN habitats:

The southeast forest is unique, largely untouched by recent glaciers that covered most of MN. There remains a legacy of hardwood forests and striking topographic relief that provides habitat worthy of protection. The value of hard mast for wildlife is widely known. Oak and walnut forests provide browse, nest and den sites, and acorns are one of the most important food items in the diets of a wide variety of game animals, such as white-tailed deer, squirrels, raccoons, foxes, wild turkeys, and wood ducks, as well as mice, voles, woodpeckers, crows, and jays. SE MN hardwood forests and woodlands support 30 species of wildlife of greatest conservation need, and 49 rare, threatened, and/or endangered plants and animals.

Please explain the nature of urgency:

SE MN forests are losing their oak and walnut component, and regeneration is difficult due to invasive species and advanced age. Blufflands/Rochester Plateau SFRMP 10-year stand exam list provides the opportunity to identify stands in need of invasive species removal and planting prior to harvest to ensure successful regeneration.

Planning

MN State-wide Conservation Plan Priorities:

- H1 Protect priority land habitats
- LU10 Support and expand sustainable practices on working forested lands

Plans Addressed:

- A Vision for Wildlife and Its Use -- Goals and Outcomes 2006-2012
- Minnesota Forest Resource Council Landscape Plans

Please describe the science based planning and evaluation model used:

Blufflands/Rochester Plateau SFRMP has assessed forest conditions, developed strategic direction and desired future composition goals on DNR lands, and selected forest stands to be visited and potentially treated over the 10-year planning period to implement the strategic direction and goals.

LSOHC Southeast Forest Section Priorities:

- Restore forest-based wildlife habitat that has experienced substantial decline in area in recent decades

Accelerates or Supplements Current Efforts:

Current funding for forest development work has been sporadic and inadequate to meet the continuous need for planting and release to ensure the successful regeneration of mast producing hardwoods to provide high quality wildlife habitat.

Non-OHF Money Spent in the Past:

Appropriation Year	Source	Amount
FY2012	State Bonding	\$80,320
FY2013	State Bonding	\$187,687
FY2014	State Bonding	\$64,827

Sustainability and Maintenance:

Planted stands will be monitored for success with regular regeneration surveys at year 1, 5, and 10, and will receive additional silvicultural treatment as necessary. Released stands 10-15 years post harvest should be "free to grow."

Maintain Project Outcomes:

Year	Source of Funds	Step 1	Step 2	Step 3
2017-2020	DNR funding	regeneration checks of first year plantings	follow-up treatment as need and funding allows	
2021-2024	DNR Funding	5-year regeneration checks of plantings	follow-up treatment as need and funding allows	
2026-2030	DNR Funding	10-year regeneration checks of plantings	follow-up treatment as need and funding allows	

Applicable Criteria:

If funded, this proposal will meet all applicable criteria set forth in MS 97A.056? - Yes

Best Management Practice:

Will restoration and enhancement work follow best management practices including MS 84.973 Pollinator Habitat Program? - Yes

Permanent Protection:

Is the activity on permanently protected land per 97A.056, subd 13(f), tribal lands, and/or public waters per MS 103G.005, Subd. 15? - Yes (WMA, State Forests, no)

Accomplishment Timeline

Activity	Approximate Date Completed
Inter-disciplinary review of stands on annual exam list, stands are site-visited, and appropriate stands for supplemental planting and/or invasives removal are selected.	2014, 2015, 2016, 2017
Trees are ordered and planted	2017, 2018, 2019, 2020
Pre-sale invasive species removal	2017, 2018, 2019, 2020
Regeneration harvest	2017, 2018, 2019, 2020
Release of mast trees 10--15 years after previous regeneration efforts	2016, 2017, 2018, 2019
1-year regeneration checks of planted sites	2018, 2019, 2020, 2021
Post-sale release of planted sites	2018, 2019, 2020, 2021

Outcomes

Programs in southeast forest region:

- Healthier populations of endangered, threatened, and special concern species as well as more common species *Southeast Minnesota forests will be enhanced to provide biologically diverse wildlife habitat for both desirable game species and endangered, threatened, special concern, and species of greatest*

conservation need, providing multiple conservation benefits in the face of climate change, invasive species, and other major stressors, and increased satisfaction from hunters and other recreational users. Wildlife populations and hunter satisfaction will be monitored.

Relationship to Other Funds:

- No Relationships Listed

Budget Spreadsheet

Total Amount of Request: \$949,000

Budget and Cash Leverage

Budget Name	LSOHC Request	Anticipated Leverage	Leverage Source	Total
Personnel	\$0	\$0		\$0
Contracts	\$640,000	\$0		\$640,000
Fee Acquisition w/ PILT	\$0	\$0		\$0
Fee Acquisition w/o PILT	\$0	\$0		\$0
Easement Acquisition	\$0	\$0		\$0
Easement Stewardship	\$0	\$0		\$0
Travel	\$0	\$0		\$0
Professional Services	\$0	\$0		\$0
Direct Support Services	\$54,000	\$0		\$54,000
DNR Land Acquisition Costs	\$0	\$0		\$0
Capital Equipment	\$0	\$0		\$0
Other Equipment/Tools	\$0	\$0		\$0
Supplies/Materials	\$255,000	\$40,000	Nat Wild Turkey Federation, MN Deer Hunters Assoc	\$295,000
DNR IDP	\$0	\$0		\$0
Total	\$949,000	\$40,000	-	\$989,000

Amount of Request: \$949,000

Amount of Leverage: \$40,000

Leverage as a percent of the Request: 4.21%

Output Tables

Table 1a. Acres by Resource Type

Type	Wetlands	Prairies	Forest	Habitats	Total
Restore	0	0	0	0	0
Protect in Fee with State PILT Liability	0	0	0	0	0
Protect in Fee W/O State PILT Liability	0	0	0	0	0
Protect in Easement	0	0	0	0	0
Enhance	0	0	3,000	0	3,000
Total	0	0	3,000	0	3,000

Table 2. Total Requested Funding by Resource Type

Type	Wetlands	Prairies	Forest	Habitats	Total
Restore	\$0	\$0	\$0	\$0	\$0
Protect in Fee with State PILT Liability	\$0	\$0	\$0	\$0	\$0
Protect in Fee W/O State PILT Liability	\$0	\$0	\$0	\$0	\$0
Protect in Easement	\$0	\$0	\$0	\$0	\$0
Enhance	\$0	\$0	\$949,000	\$0	\$949,000
Total	\$0	\$0	\$949,000	\$0	\$949,000

Table 3. Acres within each Ecological Section

Type	Metro/Urban	Forest/Prairie	SE Forest	Prairie	Northern Forest	Total
Restore	0	0	0	0	0	0
Protect in Fee with State PILT Liability	0	0	0	0	0	0
Protect in Fee W/O State PILT Liability	0	0	0	0	0	0
Protect in Easement	0	0	0	0	0	0
Enhance	0	0	3,000	0	0	3,000
Total	0	0	3,000	0	0	3,000

Table 4. Total Requested Funding within each Ecological Section

Type	Metro/Urban	Forest/Prairie	SE Forest	Prairie	Northern Forest	Total
Restore	\$0	\$0	\$0	\$0	\$0	\$0
Protect in Fee with State PILT Liability	\$0	\$0	\$0	\$0	\$0	\$0
Protect in Fee W/O State PILT Liability	\$0	\$0	\$0	\$0	\$0	\$0
Protect in Easement	\$0	\$0	\$0	\$0	\$0	\$0
Enhance	\$0	\$0	\$949,000	\$0	\$0	\$949,000
Total	\$0	\$0	\$949,000	\$0	\$0	\$949,000

Table 5. Average Cost per Acre by Resource Type

Type	Wetlands	Prairies	Forest	Habitats
Restore	\$0	\$0	\$0	\$0
Protect in Fee with State PILT Liability	\$0	\$0	\$0	\$0
Protect in Fee W/O State PILT Liability	\$0	\$0	\$0	\$0
Protect in Easement	\$0	\$0	\$0	\$0
Enhance	\$0	\$0	\$316	\$0

Table 6. Average Cost per Acre by Ecological Section

Type	Metro/Urban	Forest/Prairie	SE Forest	Prairie	Northern Forest
Restore	\$0	\$0	\$0	\$0	\$0
Protect in Fee with State PILT Liability	\$0	\$0	\$0	\$0	\$0
Protect in Fee W/O State PILT Liability	\$0	\$0	\$0	\$0	\$0
Protect in Easement	\$0	\$0	\$0	\$0	\$0
Enhance	\$0	\$0	\$316	\$0	\$0

Target Lake/Stream/River Feet or Miles

0

Parcel List

Section 1 - Restore / Enhance Parcel List

Fillmore

Name	TRDS	Acres	Est Cost	Existing Protection?
TBD	2	0	\$0	

Goodhue

Name	TRDS	Acres	Est Cost	Existing Protection?
TBD	2	0	\$0	

Houston

Name	TRDS	Acres	Est Cost	Existing Protection?
Richard J. Dorer Memorial Hardwood Forest	2	0	\$0	Yes

Olmsted

Name	TRDS	Acres	Est Cost	Existing Protection?
TBD	2	0	\$0	

Wabasha

Name	TRDS	Acres	Est Cost	Existing Protection?
Rochester Area State Wildlife Management Areas	2	0	\$0	Yes

Winona

Name	TRDS	Acres	Est Cost	Existing Protection?
Whitewater State Wildlife Management Area	2	0	\$0	Yes

Section 2 - Protect Parcel List

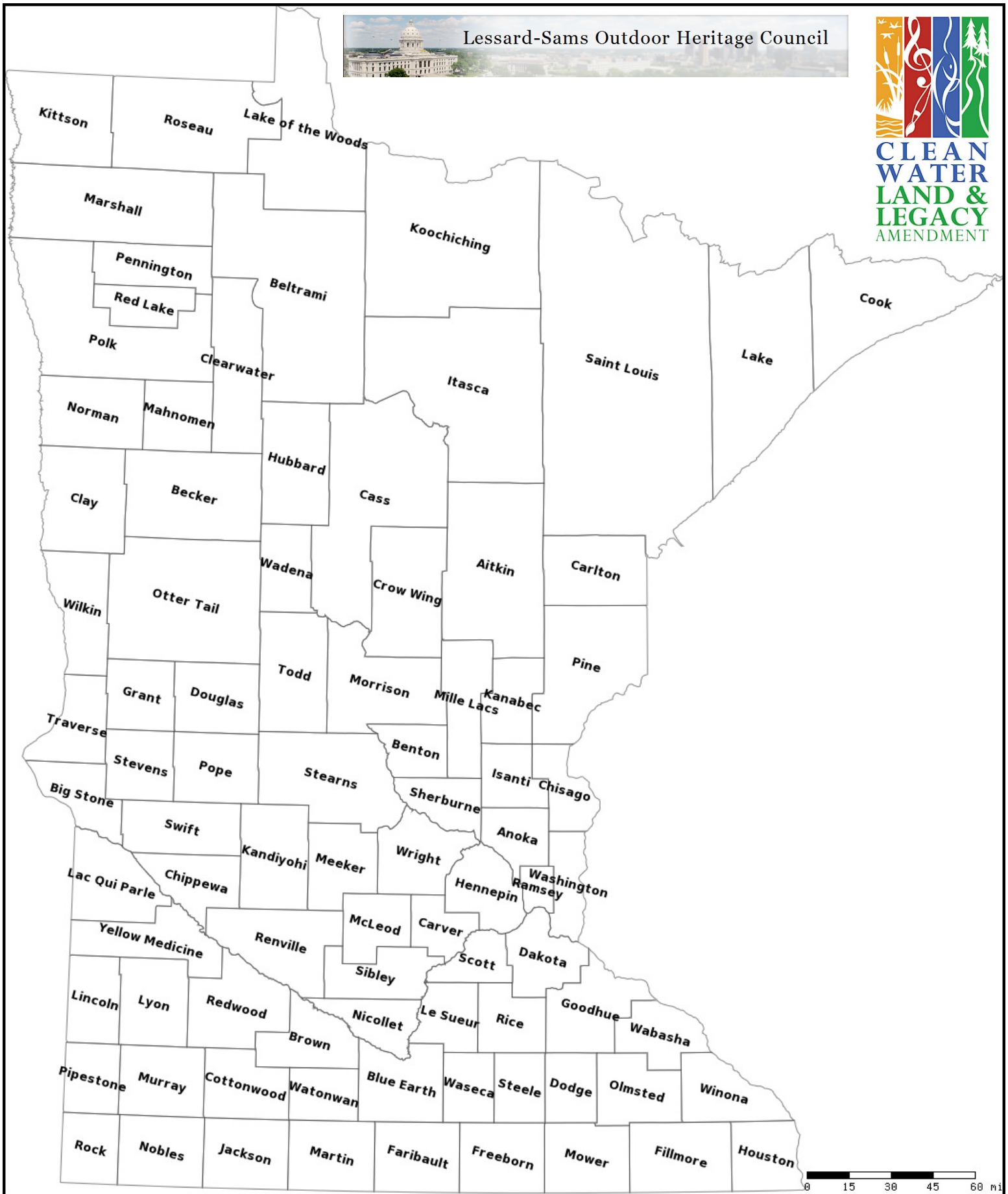
No parcels with an activity type protect.

Section 2a - Protect Parcel with Bldgs

No parcels with an activity type protect and has buildings.

Section 3 - Other Parcel Activity

No parcels with an other activity type.



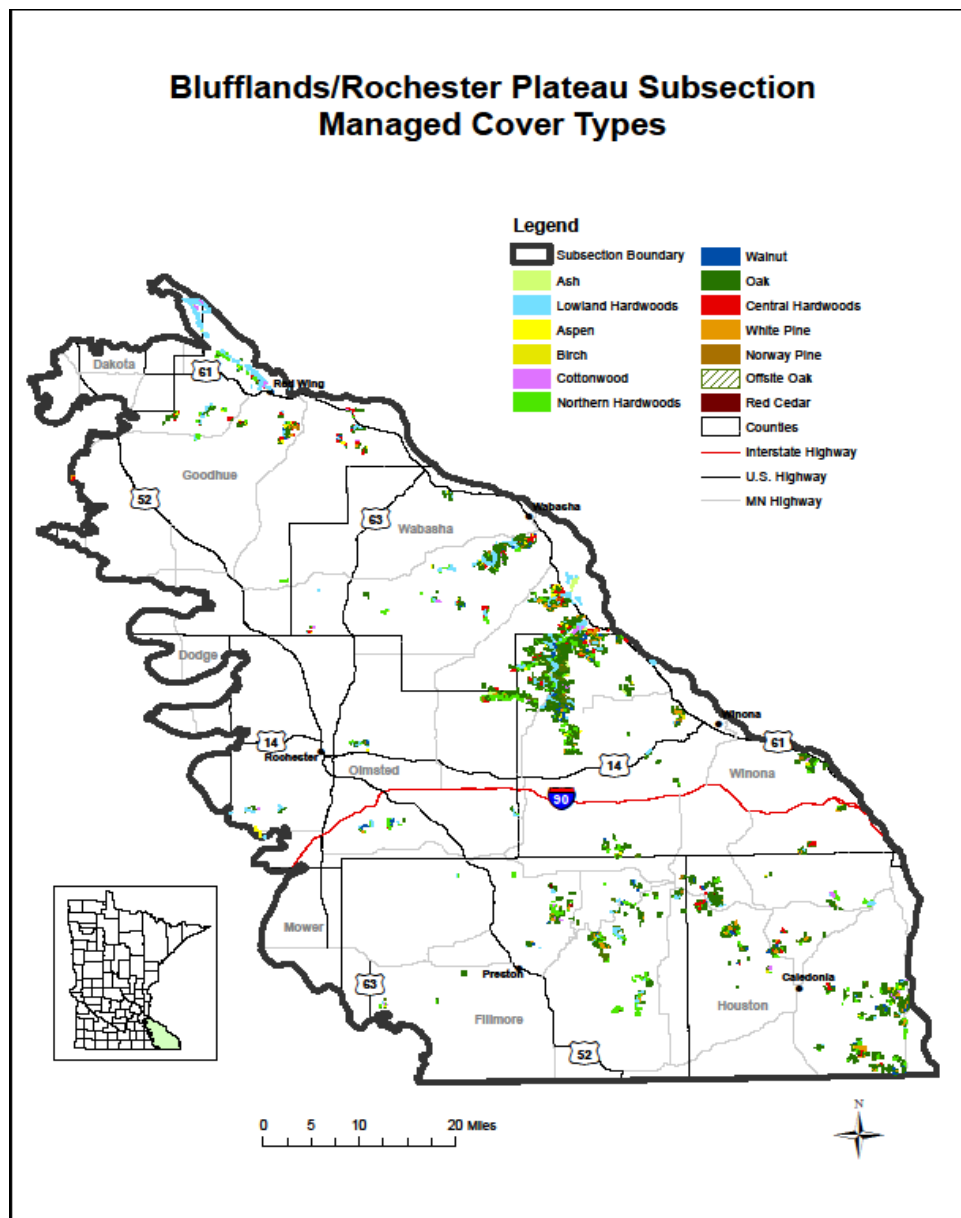
0 15 30 45 60 mi

Southeast forest habitat enhancement

Legend

- Protect in Easement
- ▲ Protect in Fee with PILT
- Protect in Fee w/o PILT
- ★ Restore
- ✕ Enhance
- + Other

Managed Cover Types on DNR Lands for the Blufflands/Rochester Plateau Subsections



Southeast MN Forest Habitat Enhancement Lessard-Sams Outdoor Heritage Council



Legend

Interstate

Highway

County Boundary

State Forest Land

Wildlife Management Area

0

10

20

40 Miles

