



DEPARTMENT OF
NATURAL RESOURCES

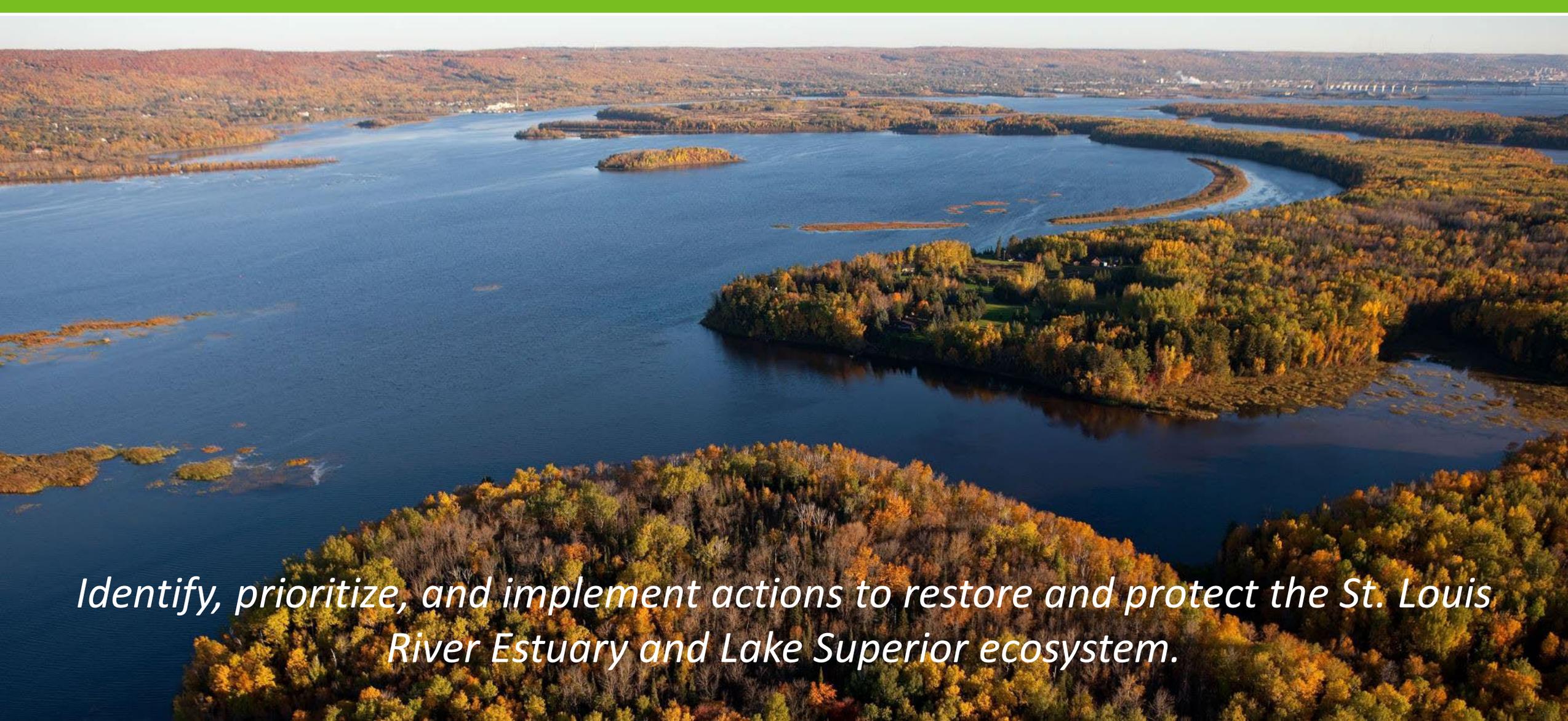
2024 Highlights from DNR's St. Louis River and Lake Superior Program

HTAC Presentation
June 5, 2024



Photo by Tim Beaulier

Purpose

An aerial photograph showing a large body of water, likely Lake Superior, with a winding river estuary flowing into it. The surrounding land is covered in dense forest with vibrant autumn foliage in shades of yellow, orange, and red. In the distance, a city skyline is visible across the water. The sky is clear and blue.

Identify, prioritize, and implement actions to restore and protect the St. Louis River Estuary and Lake Superior ecosystem.

The DNR Team

Ecological and Water Resources

- **Melissa Sjolund** – Team Supervisor, St. Louis River Area of Concern Coordinator
- **Vacant**– Lake Superior Habitat Coordinator
- **Ben Nicklay** – St. Louis River Project Manager
- **Coming soon...** Additional Project Manger

Fish and Wildlife

- **Jeremy Pinkerton** – St. Louis River Project Manager
- **Renee Samuelson** – Office and Administrative Specialist
- **Leslie Tannahill** – Grants Specialist

PLUS countless DNR resource experts & support staff!!



Legacy Impacts



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St. Louis River Area of Concern

2023 Remedial Action Plan

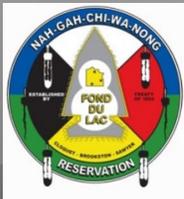
Reflects amendments to the 2022 RAP

October 1, 2022 – September 30, 2023



January 2024

Four coordinating agencies:

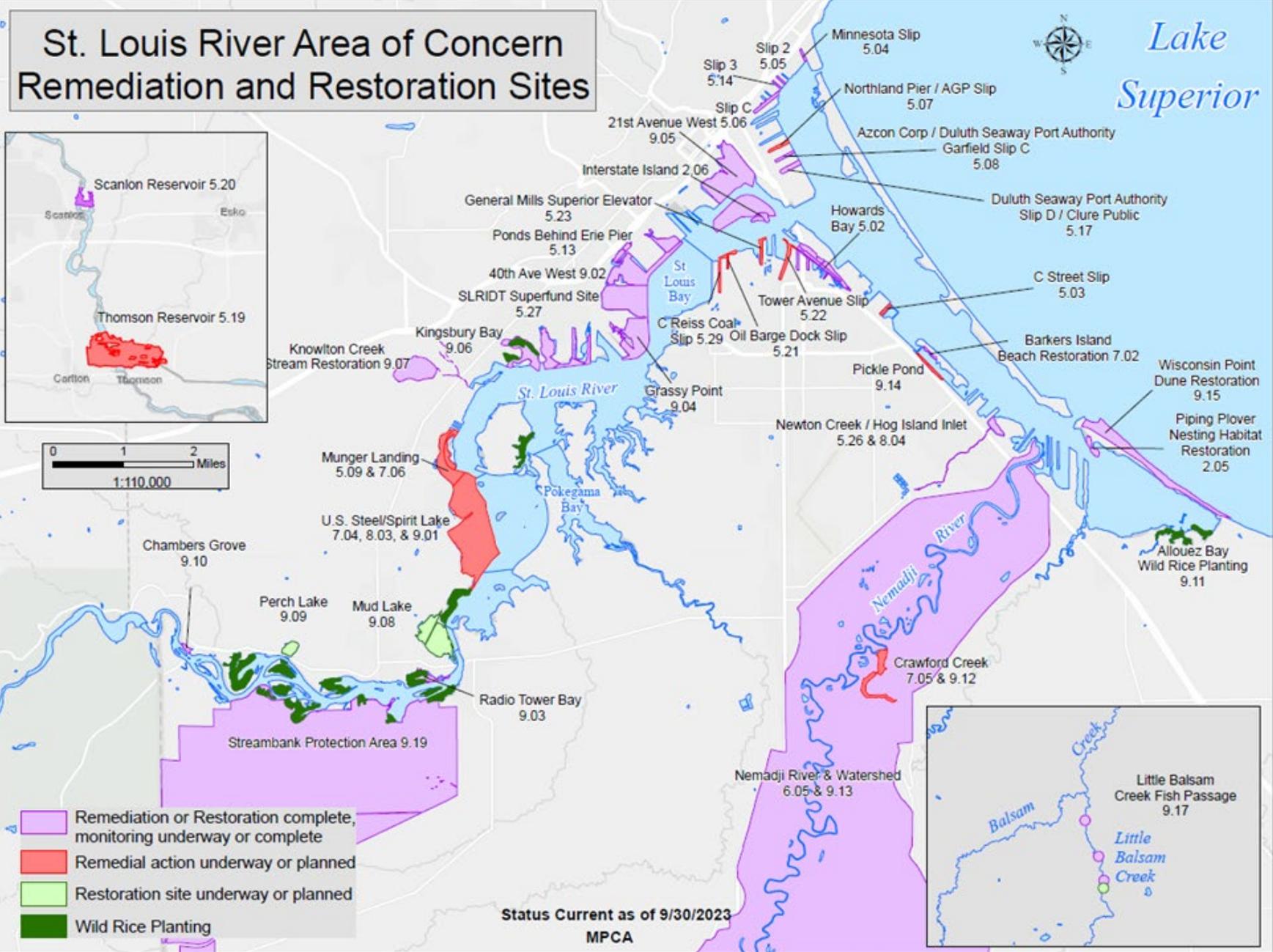
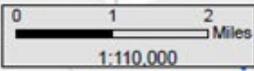
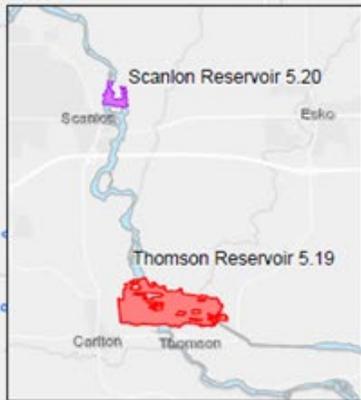


The St. Louis River is one of 43

“Areas of Concern”

St. Louis River Area of Concern Remediation and Restoration Sites

Lake Superior



AOC Projects Map

Key Partners

- City of Duluth
- Fond du Lac Band of Lake Superior Chippewa
- Minnesota Land Trust
- Minnesota Pollution Control Agency
- National Oceanic and Atmospheric Administration
- Wisconsin Department of Natural Resources
- St. Louis River Alliance
- U.S. Army Corps of Engineers
- U.S. Environmental Protection Agency



Program Funding (since 2012) totals over \$45 Million!

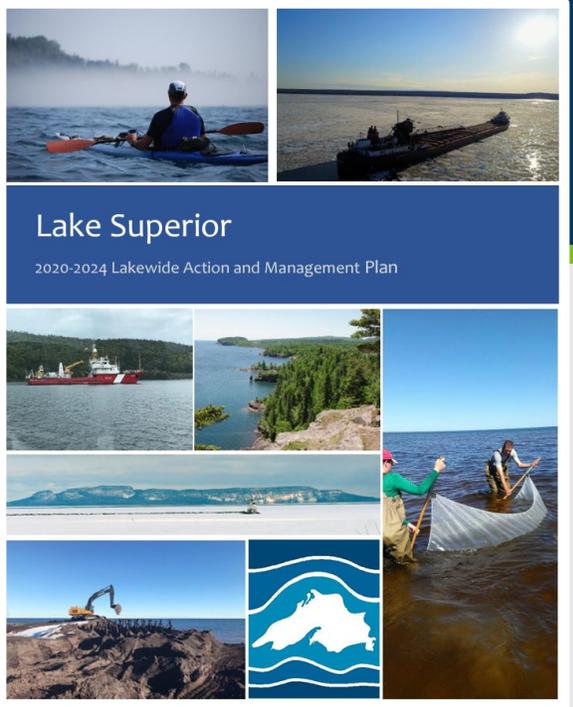
Great Lakes RESTORATION

GREAT LAKES RESTORATION INITIATIVE ACTION PLAN III

Fiscal Year 2020 - Fiscal Year 2024



October 2019



Lake Superior

2020-2024 Lakewide Action and Management Plan



Program Guidance

LAKE SUPERIOR headwaters



Sustainability Partnership

Lower St. Louis River Habitat Plan

May 2002

Update in Progress!

St. Louis River Citizens Action Committee

Minnesota's Wildlife Action Plan 2015 - 2025



working with partners for *Wildlife Conservation*



Duluth Parks & Recreation

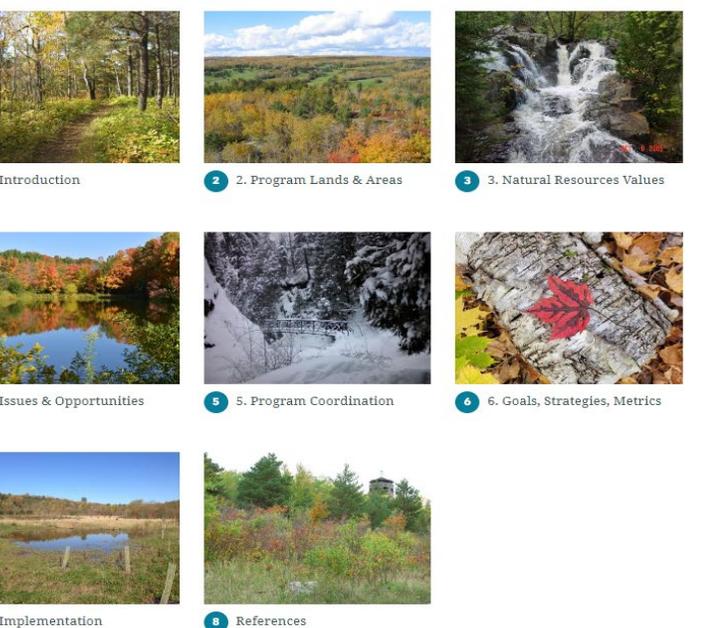
Collection

Duluth's Natural Resources Management Program Plan

March 2022

Click on the image to explore each chapter

Get started



1. Introduction
2. Program Lands & Areas
3. Natural Resources Values
4. Issues & Opportunities
5. Program Coordination
6. Goals, Strategies, Metrics
7. Implementation
8. References

Past Projects



Current work: Perch Lake 2022-2024



PHASE 1 (2022)

- Dredge sediment & organic material
- Restore coastal wetlands
- Create deep fish habitat
- Create hemi-marsh
- Enhance spawning areas

PHASE 3 (2024)

- Install trail bridge
- Complete connection!



Current work: Perch Lake 2022-2024



PHASE 2 (2023-24)

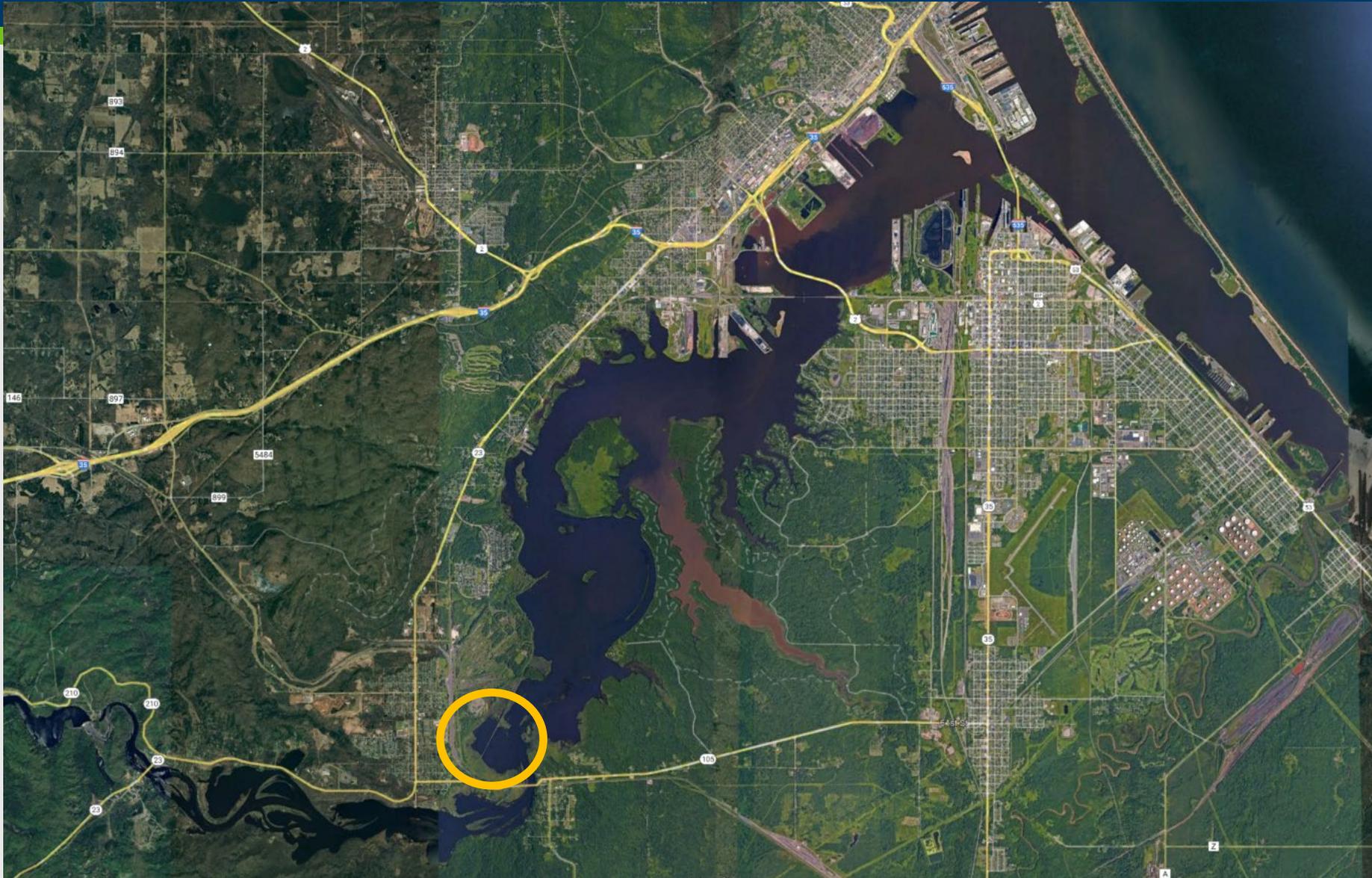
- Install culvert
- Improve connectivity
- Increase circulation
- Restore access



Photo Credit: Sam Greer

Current work: Mud Lake

Construction estimate: 2025-2026

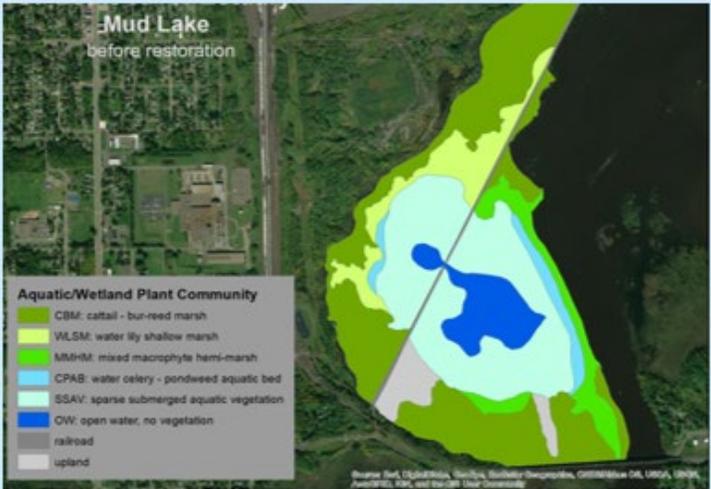


Current work: Mud Lake

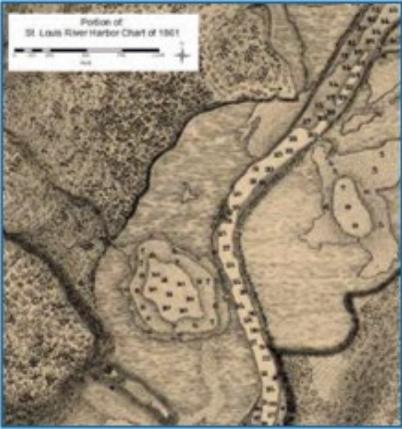
Construction estimate: 2025-2026



GOAL: Restore hydrologic connection and diversify habitat



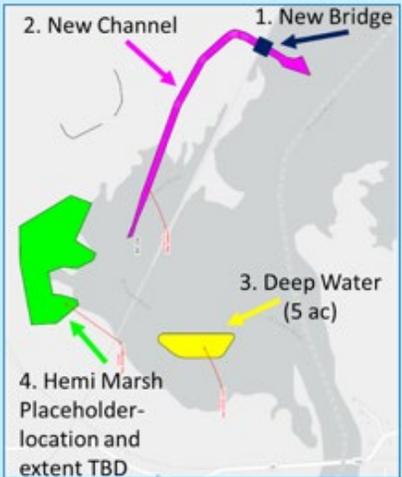
BASELINE VEGETATION SURVEY



HISTORIC (1861) CONDITIONS



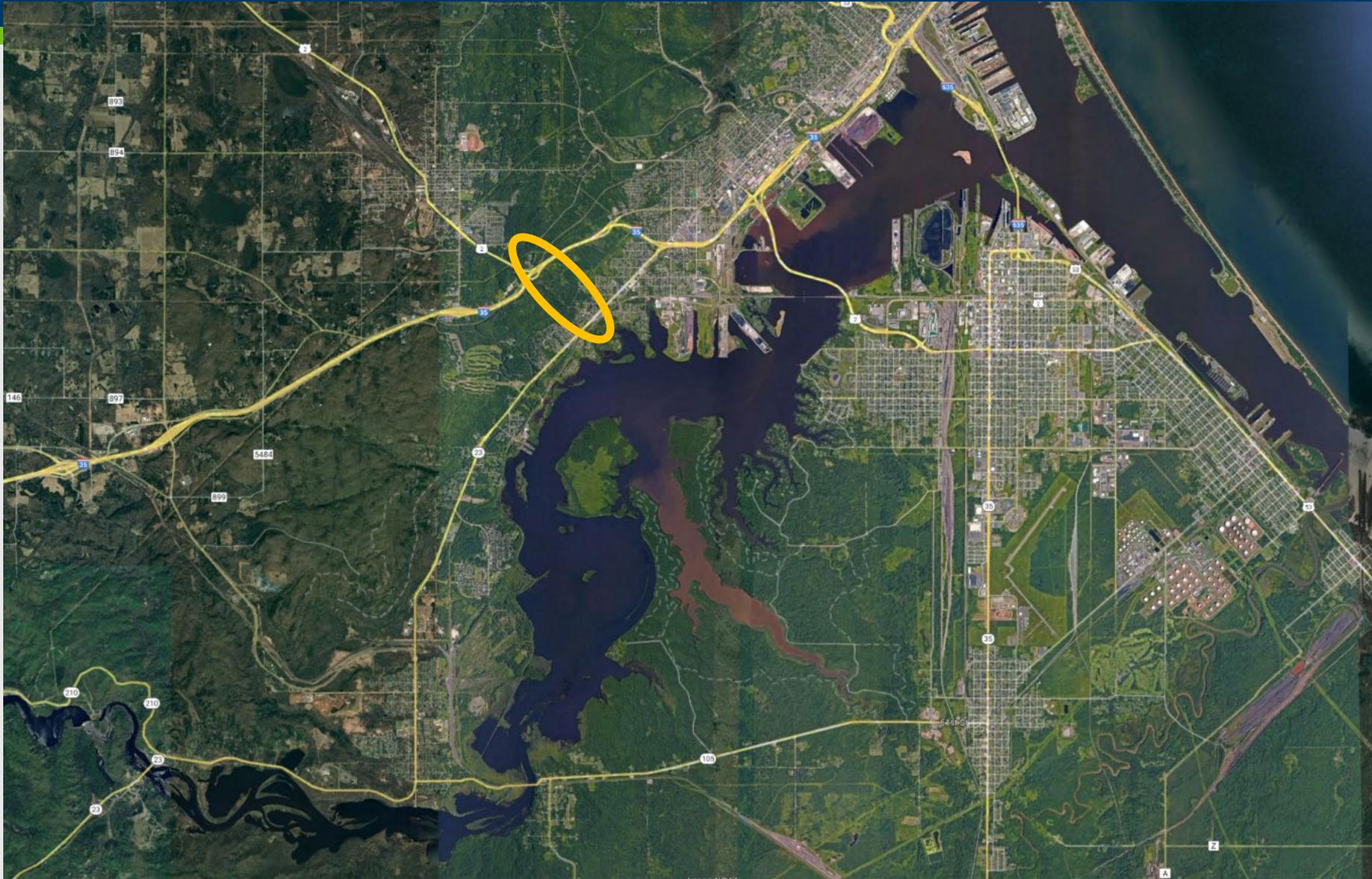
DISSOLVED OXYGEN & GEOTECHNICAL DATA COLLECTION



30% DESIGN ELEMENTS

Current work: Kingsbury Bay Watershed

Substantially Complete Spring 2024



Current work: Kingsbury Bay Watershed *Substantially Complete Spring 2024*

GOAL: Restore habitat and reduce sediment delivery to Kingsbury Bay

- Restored 7 stream reaches totaling 2600 ft/5.4 acres
- Reduced sediment delivery by an estimated 429 tons/year
- Added resiliency to previous downstream restoration



Current work: Forested Avian Habitat

336 acres In progress, or completed

Duluth Stream Corps

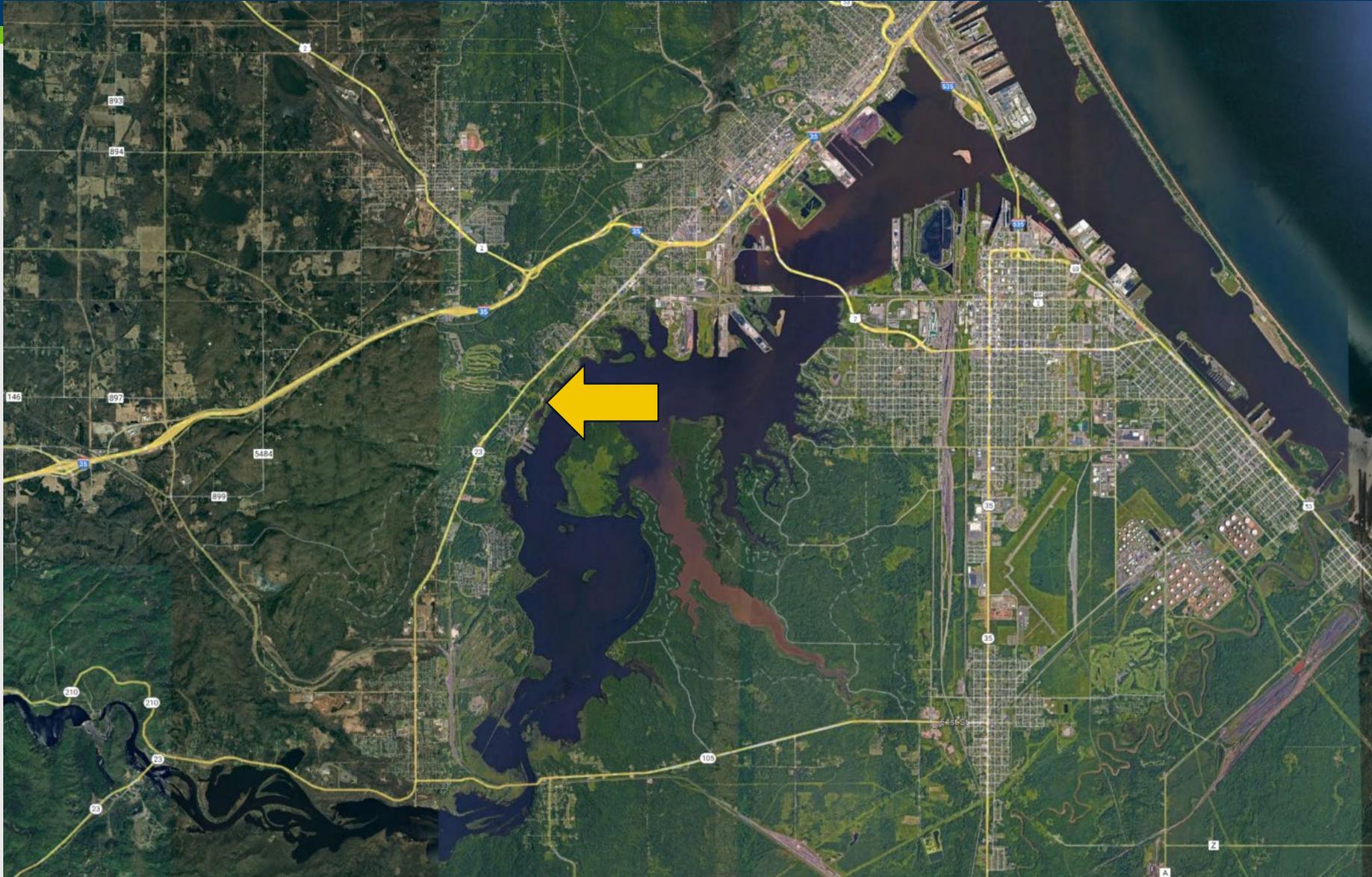


GOAL: Improve resiliency in high quality coastal forests

- 20 species native shrubs & trees
 - Focus on benefiting birds, Green/Black Ash advance replacement
 - Engagement: Community Action Duluth & YouthWorks
- 

Current work: Knowlton Creek Fish Passage

Construction estimate: 2025



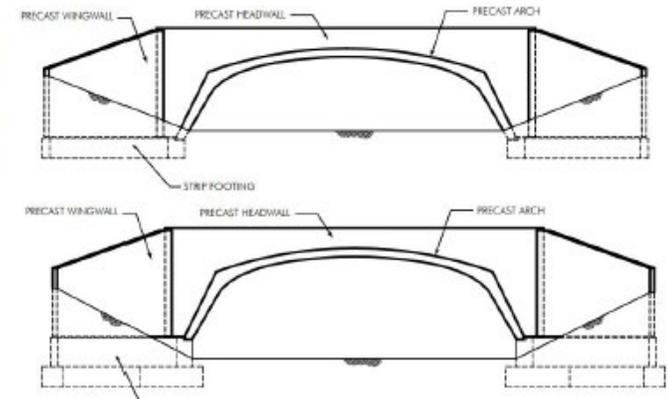
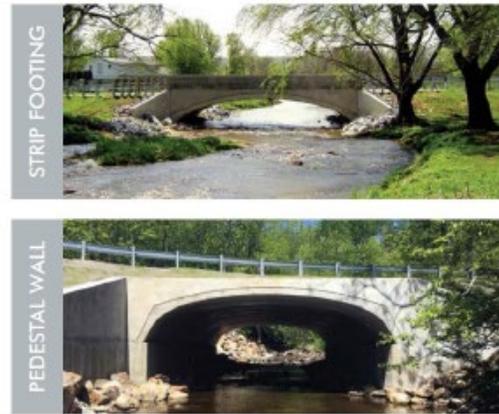
Current work: Knowlton Creek Fish Passage

Construction estimate: 2025



Example Structures

Foundations



Current status:

- Reaching 65% design
- Geotechnical investigation, wetland delineation, and arch. survey complete

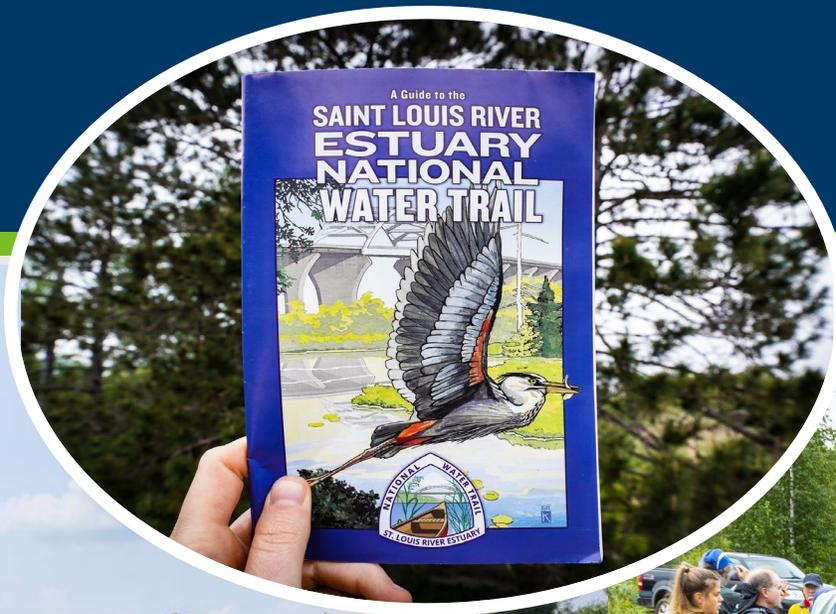
Anticipated leverage funding through “Get Out More”

Seeing the Results

Photo: City of Duluth



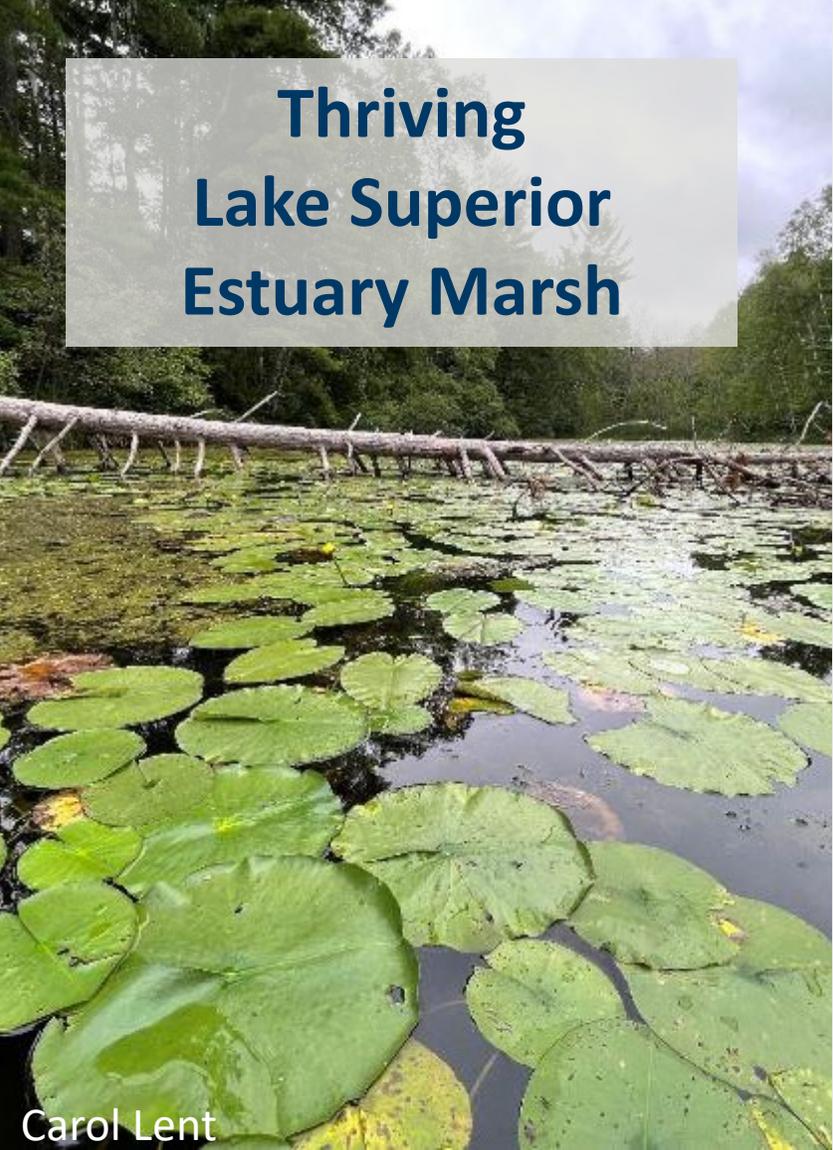
Seeing the Results



St. Louis River Alliance



Looking Toward the Future



**Thriving
Lake Superior
Estuary Marsh**



**Healthy, connected
Terrestrial Habitats**



Resilient Streams

Photo credit: Ken Greshowak

Closing Thoughts

The St. Louis River Estuary is...

- An unmatched habitat resource
- Unique and incredibly diverse

We are making a difference!



Thank You!

Melissa Sjolund

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