

PROJECT BRIEF:

MCQUADE RAVINE STABILIZATION



PROJECT LEAD:



PROJECT PARTNERS:



PRIORITY WATER BODY SERVED:

St. Croix River

PROJECT LOCATION:

Denmark Township, MN

POLLUTANT REDUCTION:

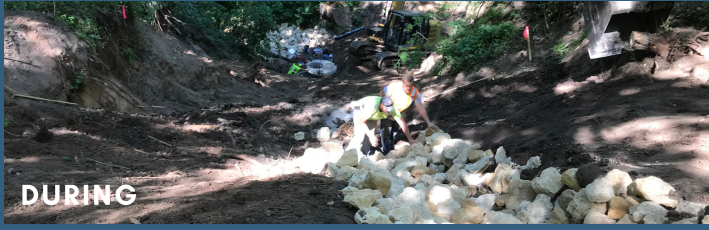
- ~295 tons per year of sediment
- ~251 lbs of phosphorus per year

PROJECT COST

\$175,000 total (including \$93K LSC WBIF funding)

LIFETIME COST-BENEFIT (\$/LB PHOSPHORUS REMOVAL)

Approximately \$22 per lb (50 year project lifespan estimate)



DURING



BEFORE



AFTER



AFTER

PROJECT SUMMARY

The McQuade ravine, located in Denmark Township, Minnesota, directly drains to the St. Croix River. In recent years, excessive amounts of sediment (estimated up to 250 tons per year) from gully incision and mass wasting of bank and bluffs has occurred, especially after large rainfall events.

In Summer 2021, the South Washington Watershed District requested funding from the Lower St. Croix Watershed Based Implementation Funding (WBIF) to stabilize the ravine. The gully bottom was regraded and reinforced by wood and stone check dams to reduce erosion and promote water infiltration.

PROJECT CONSERVATION BENEFITS

CLEAN WATER



Pollutant reduction will improve water quality and prevent algal growth.

EROSION CONTROL



Stabilize an eroding gully and channel, mitigating loss of land.