NAVIGATION AND ECOSYSTEM SUSTAINABILITY PROGRAM QUARTERLY MEETING

Upper Mississippi Ports Meeting

Date: 10 October 2024

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NESP Regional Program Manager
USACE Rock Island District

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Starved Rock Habitat Rehabilitation - Project Complete

Twin Island – Project Complete

Moore's Towhead - Project Complete

ONGOING ACTIVITIES

Navigation Improvements

- Lock 25 new 1200' Lock continued design – project is in the 65% review stage.Three construction contracts awarded to date.
- LaGrange new 1200’ Lock design and initial construction contract (machinery fabrication). Machinery fabrication contract awarded!
- Mooring facility construction contracts awarded at Locks 11, 14, 15, 20, 22.
- Pool 4 construction.
- Lock 14 mooring cell complete.

Ecosystem Restoration

- Lock and Dam 22 Fish Passage contract awarded!
- Continued project planning and design on all projects initiated in fiscal years 2022 and 2023.
- Programmatic activities:
  - Reach planning
  - Adaptive management
  - Forest management
  - Water level management
  - Strategic planning

NESP PROGRAM FUNDING (LAST THREE FISCAL YEARS)

Funding Type	Total Received
Bi-Partisan Infrastructure Law of 2022	$829.1M - $732M for Lock 25 New 1200’ Lock and $97.1M for Lock and Dam 22 Fish Passage
FY22 Congressionally Directed Spending	$45.1M - $27.1M for Navigation Projects and $18M for Ecosystem Projects
FY22 USACE Work Plan	$12.179 million for Systemic Mitigation Efforts
Funding Type	**Total Received**
FY23 Congressionally Directed Spending	$49.3M for LaGrange New 1200’ Lock Design
FY23 USACE Work Plan	$18.379M for Ecosystem Projects
Funding Type	**Total Received**
FY24 Congressionally Directed Spending	$120M for Navigation and Ecosystem projects

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NAVIGATION AND ECOSYSTEM SUSTAINABILITY PROGRAM (NESP)

ST. PAUL DISTRICT- ROCK ISLAND DISTRICT - ST. LOUIS DISTRICT

NAVIGATION AND ECOSYSTEM COMPLETED PROJECTS AND ACTIVITIES

US Army Corps of Engineers

Since 2022, NESP has received significant funding from Congressionally Directed Spending, USACE Work Plan, and the Fiscal Year 2022 Bi-Partisan Infrastructure Law. The program received the "new start" for construction on January 19, 2022.

Since 2022, the program has obligated more than $200M for the navigation and ecosystem projects shown.

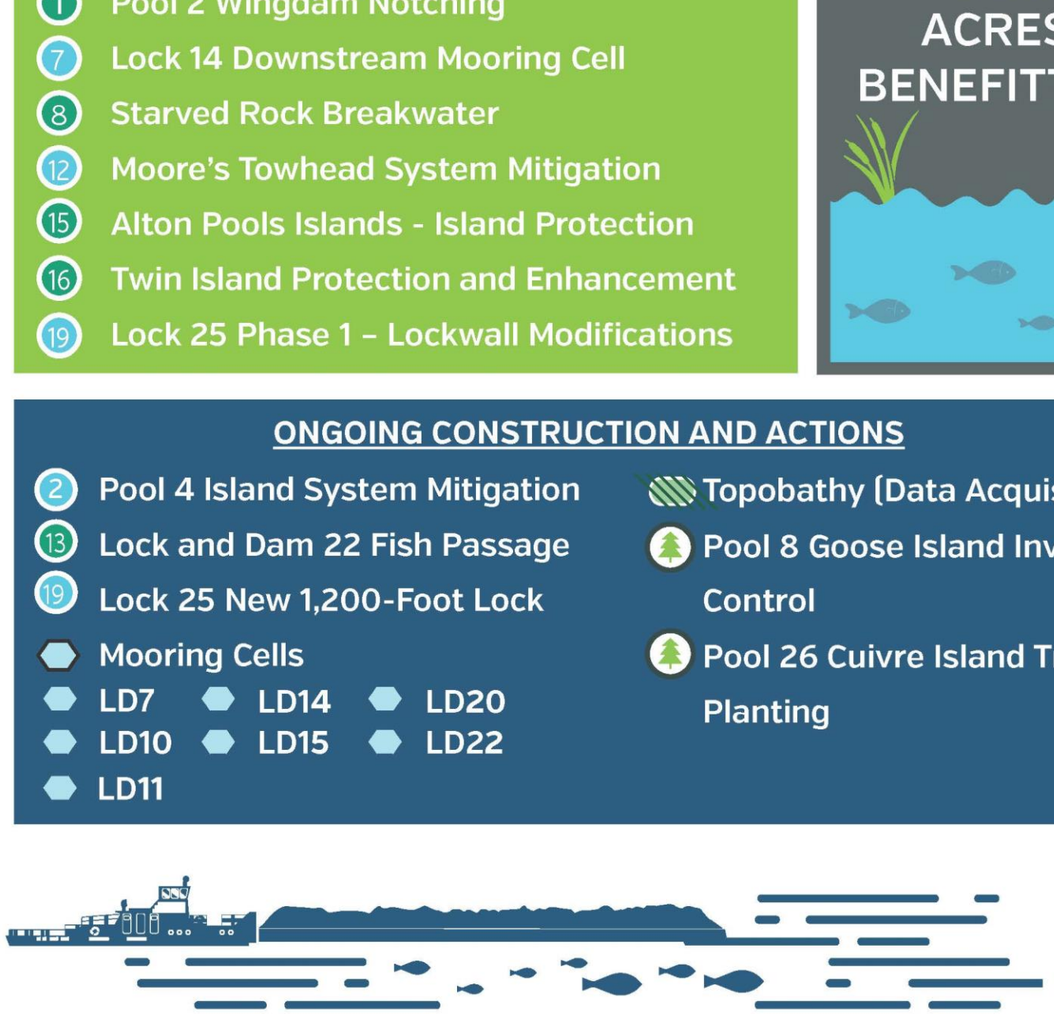
CONSTRUCTION COMPLETE

- 1 Pool 2 Wingdam Notching
- 7 Lock 14 Downstream Mooring Cell
- 8 Starved Rock Breakwater
- 12 Moore's Towhead System Mitigation
- 15 Alton Pools Islands - Island Protection
- 16 Twin Island Protection and Enhancement
- 19 Lock 25 Phase 1 – Lockwall Modifications

413 ACRES BENEFITTED

ONGOING CONSTRUCTION AND ACTIONS

- 2 Pool 4 Island System Mitigation
- 13 Lock and Dam 22 Fish Passage
- 19 Lock 25 New 1,200-Foot Lock
- Mooring Cells
  - LD7, LD10, LD11, LD14, LD15, LD20, LD22
- Topobathy (Data Acquisition)
- Pool 8 Goose Island Invasive Control
- Pool 26 Cuivre Island Tree Planting



Map numbers indicate congressional districts

NESP PARTNERS

USGS science for a changing world

DEPARTMENT OF NATURAL RESOURCES

U.S. FISH & WILDLIFE SERVICE

WISCONSIN DEPT. OF NATURAL RESOURCES

UMRBA Upper Mississippi River Basin Association

IOWA DNR IOWA DEPARTMENT OF NATURAL RESOURCES

CONSERVATION DEPARTMENT MISSOURI

ILLINOIS DEPARTMENT OF NATURAL RESOURCES

PROJECTS COMPLETED

Lock 25 Phase 1 – Construction Complete

7

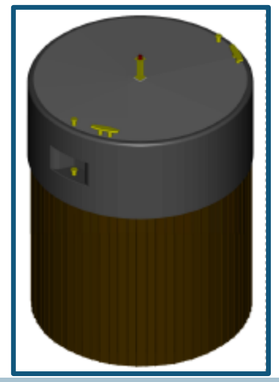
completed construction projects since 2022

Pool 2 Wingdam Notching

Moore’s Towhead System Mitigation

413 acres of habitat benefited

Starved Rock Breakwater



Lock 14 Downstream Mooring Cell

Alton Pools Islands

Twin Island

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NAVIGATION AND ECOSYSTEM SUSTAINABILITY PROGRAM (NESP)

ST. PAUL DISTRICT- ROCK ISLAND DISTRICT - ST. LOUIS DISTRICT

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NAVIGATION AND ECOSYSTEM ONGOING PROJECTS

The Navigation and Ecosystem Sustainability Program (NESP) is a long-term, dual-purpose program that integrates navigation improvements and ecosystem restoration together to provide Upper Mississippi River System once in a generation-type positive impacts.

The primary goals of the program are to increase the capacity and improve the reliability of the inland navigation system while restoring, protecting, and enhancing the environment.

This map only shows projects actively being implemented. NESP includes an additional 5 - 1,200-foot locks, systemic mitigation, and hundreds of ecosystem restoration projects.

CONSTRUCTION

- 2 Pool 4 Island System Mitigation
- 13 Lock and Dam 22 Fish Passage
- 19 Lock 25 New 1,200-Foot Lock

DESIGN

- 3 Wacouta Bay

AE SERVICE CONTRACTS

- 9 Andalusia Island Complex Planning
- 11 LaGrange New 1,200-Foot Lock Design

ONGOING PROJECT PLANNING

- 4 Johnson Island
- 5 Sny Magill, Effigy Mounds National Monument
- 6 Sabula Lakes
- 10 Liverpool Flowing Side Channel
- 14 Pool 24 Island Restoration - Denmark and Drift Islands Complex
- 17 Clarksville/Carroll Island Side Channel
- 18 Hausgen Island Side Channel
- 20 MMR - NWR - Horse Island
- 21 Middle Mississippi River Stone Dike Alterations Phase 1

SYSTEMIC FOREST MANAGEMENT

- Pool 5A McNally Invasives
- Pool 11 Forest Inventory
- Pool 17 Forest Inventory
- Pool 24 Gilbert Island Tree Planting
- Pool 25 Mason Island Forest Inventory
- Pool 25 Slim Island Forest Inventory
- Pool 26 Mile 215 Tree Planting

https://www.mvr.usace.army.mil/Rock-Island-District/Programs/NESP/

Map numbers indicate congressional districts

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NAVIGATION AND ECOSYSTEM SUSTAINABILITY PROGRAM (NESP)

ST. PAUL DISTRICT- ROCK ISLAND DISTRICT - ST. LOUIS DISTRICT

As of 21-Oct-24

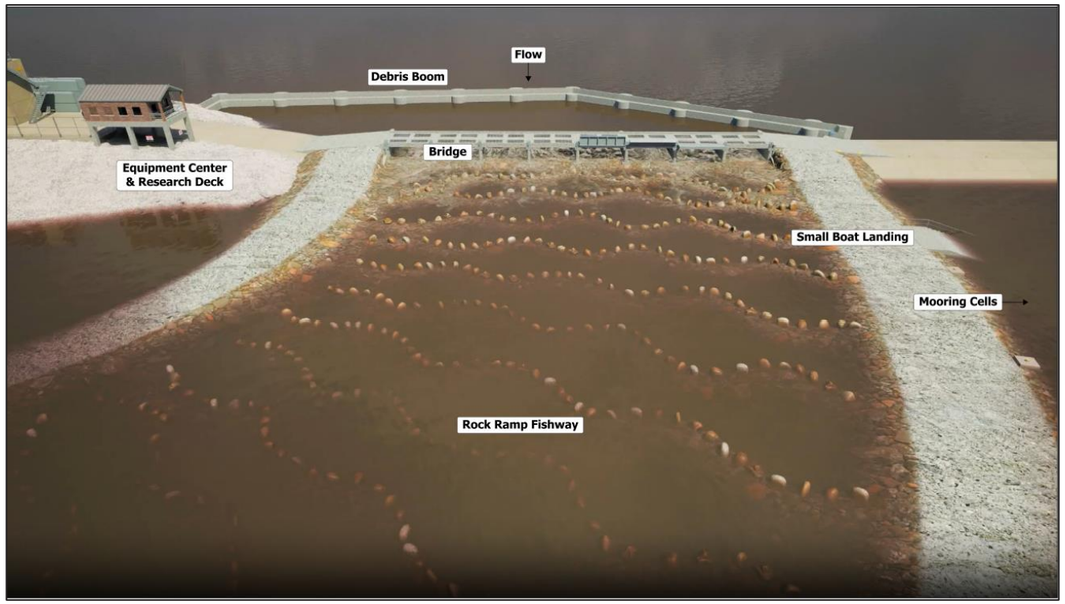
LOCK AND DAM 22 FISH PASSAGE

PROJECT SUMMARY

Lock and Dam 22 is located near Saverton, Missouri, on the Mississippi River, roughly 10 miles south of Hannibal, Missouri, at river mile 301.2. The fish passage structure will be constructed on the spillway portion of the dam, on the side furthest from the Illinois shoreline, and would extend downstream into the tailwater area.

The primary purpose of the Lock and Dam 22 Fish Passage Project is to increase fish access to upstream mainstream river and tributary habitats. Increased access to upriver habitat should result in an increase in the size and distribution of native migratory fish populations.

The secondary purpose is to monitor and adaptively manage this structure to optimize its effectiveness and inform design of subsequent fish passage projects.



DESIGN

- HQUSACE approved Final PIR June 2022
- Implementation Review Plan
- Single Phase—Inlet Structure & Ice/Debris Structure; Rock Arch Fish Passage

CONSTRUCTION

- Single Phase—Inlet Structure & Ice/Debris Structure; Rock Arch Fish Passage

ADAPTIVE MANAGEMENT

- Pre-Construction Monitoring
- Construction Monitoring
- Post-Construction Monitoring
- Adaptive Management

MIGRATORY FISH SPECIES OF THE UPPER MISSISSIPPI RIVER

Project Deliverables & Tasks:

- Mar 2024 – 100% Design Completion
- Jun 2024 – Construction Solicitation
- Sep 2024 – Construction Award
- Sep 2027 – Construction Complete

Monitoring Activities

- FY22-24 – Pre-Construction Monitoring
- FY25-27 – Construction Monitoring
- FY28-32 – Post-Construction Monitoring
- FY28-32 – Adaptive Management

Lock and Dam 22 Fish Passage Monitoring

- Inform Project Design and Construction
- Monitor Fish Movement through Lock 22 and Fishway
- Monitor Systemic Ecological Response by Migratory Fishes
- Monitor Physical Performance of the Fish Passage Improvement Features
- Monitor Effects of the Project on Structural Integrity, Navigation Operations, Water Quality

https://www.mvr.usace.army.mil/Rock-Island-District/Programs/NESP/Ecosystem-Restoration/

BI-PARTISAN INFRASTRUCTURE LAW (BIL) FUNDS: $97.1M, FY24 Congressionally Directed Spending: $25.5M

OBJECTIVES

1. Provide habitat benefits for over 30 fish species
2. Restore natural connection between pools
3. Increase migration capabilities for native fish species
4. Provide spawning habitat for fish

ESTIMATED COST >$20M

PROJECT SCHEDULE

- FEASIBILITY APPROVAL — SUMMER 2022
- SPRING 2022 — START DESIGN AND PRE-CONSTRUCTION MONITORING
- 100% DESIGN COMPLETION — WINTER 2023/2024
- SPRING-FALL 2024 — CONSTRUCTION SOLICITATION AND AWARD
- CONSTRUCTION AND MONITORING — 2025-2027
- 2027-2032 — POST-CONSTRUCTION MONITORING AND ADAPTIVE MANAGEMENT

PROGRAM PARTNERS

USGS science for a changing world; UMRBA Upper Mississippi River Basin Association; U.S. Fish & Wildlife Service; Department of Natural Resources; Wisconsin Dept. of Natural Resources; Iowa DNR Iowa Department of Natural Resources; Conservation Department Missouri; Illinois Department of Natural Resources