

### MULTIPLE AGENCY MONITORING OF THE ILLINOIS RIVER

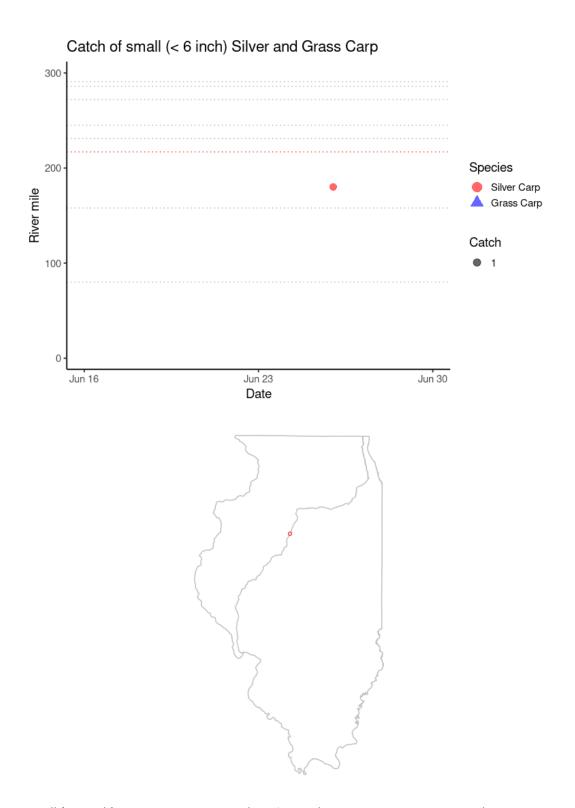
IL DNR/USFWS/INHS

## June 2025 Highlights

Small (< 6 inch) carp caught during June

All reported catches are provisional and subject to further QAQC.

-	Silver Carp	Grass Carp
Lockport	0	0
Brandon Road	0	0
Dresden Island	0	0
Carp-Likely (DR/KK)	0	0
Kankakee River	0	0
Marseilles	0	0
Starved Rock	0	0
Peoria	1	0
La Grange	0	0
Alton	0	0



Small (< 6 inch) invasive carp capture locations. Silver Carp captures are in red, Grass Carp in blue Sampling sites completed during June

-	E-fish	Fyke net	Hoop net	Mini-fyke net	Dozer trawl
Lockport	13	0	0	0	14
Brandon Road	1	0	0	4	12
Dresden Island	3	1	0	6	24
Carp-Likely (DR/KK)	6	0	0	0	0
Kankakee River	0	0	0	0	5
Marseilles	5	0	0	6	30
Starved Rock	5	1	0	12	14
Peoria	21	5	7	6	14
La Grange	18	2	4	4	10
Alton	11	0	6	6	14

# CONTRACTED COMMERCIAL FISHING BELOW THE ELECTRIC DISPERSAL BARRIER

#### **IDNR**

#### Introduction

Contracted Commercial Fishing Below the EDBS uses contracted commercial fishers to reduce invasive carp abundance and monitor for changes in range in the Des Plaines River and upper Illinois River downstream of the EDBS. By decreasing invasive carp abundance, we anticipate reduced migration pressure towards the barrier, lessening the chances of invasive carp gaining access to upstream waters in the CAWS and Lake Michigan. Monitoring for upstream expansion of invasive carp should help identify changes in the leading edge, distribution, and relative abundance of invasive carp in the IWW. The "leading edge" is the furthest upstream location where multiple Bighead Carp or Silver Carp have been captured with conventional sampling gears during a single trip or where individuals of either species have been caught in repeated sampling trips to a specific site. Trends in catch data over time may also contribute to understanding invasive carp population abundance and movement between and among pools of the IWW.

Dresden Island	June 2025
Yards of Net	1,200
Bighead Carp	0
Grass Carp	1
Silver Carp	15
Invasive Carp Caught	16
Invasive Carp Dresden Above I55	0
Invasive Carp Dresden Below I55	16
Invasive Carp Rock Run	0
IC/1000 yards	12.5

Marseilles	June 2025
Yards of Net	600
Bighead Carp	0
Grass Carp	0
Silver Carp	105
Invasive Carp Caught	105

IC/1000 yards	175
Invasive Carp Pounds	1,765

### Starved Rock June 2025

Yards of net	74,350
Bighead Carp	111
Grass Carp	31
Silver Carp	16,691
Invasive Carp Caught	16,833
IC/1000 yards	226.4
Invasive Carp Pounds	110,083

## BARRIER MAINTENANCE AND FISH SUPPRESSION

IL DNR, USACE

## June 2025 Highlights

The agencies did not submit an update.

#### SUMMARY EVALUATION OF BIO-ACOUSTIC FISH FENCE DETERRENT

USFWS, USGS

### Introduction

This project will test the effectiveness of a Bio-Acoustic Fish Fence (BAFF) at deterring Silver Carp and Grass Carp from crossing the BAFF and from crossing through the Barkley Lock on the Cumberland River, KY. This sound, bubble, and light deterrent is designed to have a greater effect on invasive carp than on native species. This deterrent could be part of a multi-deterrent approach to prevent movement through a lock chamber where the lock is the only option for fish to move upstream (e.g., Brandon Road Lock and Dam) or in combination with a yet to be developed deterrent that slows passage through dam gates during open river while the BAFF deters fish from passing via the lock chamber (e.g., Starved Rock Lock and Dam).

## June 2025 Highlights

The agencies stated there was no update.

#### INVASIVE CARP ENHANCED CONTRACT FISHING REMOVAL PROGRAM

**ILDNR** 

#### Introduction

In September 2019, the Enhanced Contract Fishing Program was initiated in the Peoria Pool of the Illinois River. In 2022, the area was expanded to include the LaGrange and Alton pools. The program offers Illinois-licensed commercial fishers \$.10 per pound for invasive carp caught in any of these pools and sold to fish processors or other buyers for at least \$.07 per pound. To date, a total of 68 fishers have entered into contracts to catch invasive carp from these pools, with 50 currently under contract. From inception through June 2025, 39,864,039 pounds of invasive carp have been caught among all three pools. Of these total catches, 2.75% are Bighead, 87.58% are Silver, and 9.67% are Grass carp. No Black carp have been reported as these are reported through the Black Carp Bounty Program.

## June 2025 Highlights

The table below summarizes the total pounds of invasive carp caught through enhanced contract fishing.

YEAR	Total Lbs.**	Bighead	Silver	Grass	
2019 *	518,132	24,813	310,297	183,022	
2020	2,882,724	176,195	1,980,175	726,355	
2021	3,345,973	209,526	2,517,416	619,031	
2022	5,249,161	200,396	4,615,097	433,669	
2023	8,410,107	95,532	8,024,643	289,932	
2024	6,336,449	90,865	5,821,067	424,517	
2025 Part Year					
January	87,108	0	72,025	15,083	
February	479,791	0	415,750	64,041	
March	657,157	2,228	606,351	48,578	
April	684,091	7,809	632,634	43,648	
Мау	848,051	10,480	821,418	16,153	
June	365,298	4,586	336,788	23,924	
2025 Part Year Subtotal	3,121,495	25,103	2,884,965	211,427	
GRAND TOTALS	29,864,039	822,428	26,153,660	2,887,951	

<sup>\*</sup> September 2019 program inception.

<sup>\*\*</sup> No Black carp reported.

#### USFWS ILLINOIS WATERWAY HYDROACOUSTICS

**USFWS** 

#### Introduction

The purpose of USFWS hydroacoustic monitoring in the upper Illinois Waterway (IWW) is to enhance invasive carp management by reporting spatial and temporal patterns of fish abundance. Hydroacoustic data aids operation, maintenance, and response at the electric dispersal barrier system (EDBS). Density and distribution data enhance targeted harvesting efforts throughout navigational pools. Consistent hydroacoustic data collection allows managers to annually assess the risk of further upstream spread of invasive carp. Hydroacoustic estimates of length and depth of targets, along with corresponding telemetric data, allow managers to make inferences about possible fish species identified as targets. Targets detected across replicate surveys may identify the same target. USFWS hydroacoustic barrier surveys are conducted monthly, and pool scans are conducted annually in the fall. Additional barrier and pool scans can be conducted upon request. Further details regarding the methods of data collection and use of hydroacoustic data can be provided upon request.

### June 2025 Highlights

The results of the mobile hydroacoustic fish surveys are presented below:

- Hydroacoustic barrier scan on June 2<sup>nd</sup>, 2025, identified a total of 4 targets (1 target within the EDBS and 3 targets immediately downstream of the barrier). An average of 1.33 ± 0.58 targets were detected during the three replicate surveys. The mean target length was 14.6 inches ± 2.8 inches.
- Figure 1 shows the average targets detected across all three replicate surveys.
- No hydroacoustic pool scans were completed in the month of June.

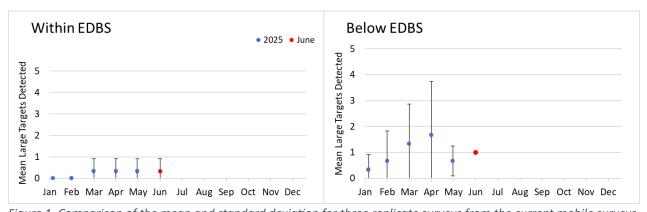


Figure 1. Comparison of the mean and standard deviation for three replicate surveys from the current mobile surveys with previous surveys from 2025.

# SUPPORT FOR EARLY DETECTION OF INVASIVE CARP IN THE UPPER ILLINOIS WATERWAY

**USFWS Wilmington** 

#### Introduction

The purpose of U.S. Fish and Wildlife Service (USFWS) Wilmington Substation's early detection monitoring (EDM) is to detect juvenile and adult invasive carp (Bighead, Silver, Black, and Grass Carp) at the invasion front. A combination of traditional boat electrofishing, electrified dozer trawling, mini-fyke netting, and gill netting are used in main-channel border, side-channel, and backwater habitats in the Marseilles, Dresden Island, Brandon Road, and Lockport Pools of the upper Illinois Waterway (IWW), and lower Kankakee River. Rarefaction analysis is performed annually to ensure an extremely high probability that sampling efforts are detecting any changes in invasive carp population status. The application of fishing gears across pools and habitats, utilizing fixed and random sites, is assessed annually based on the results of this analysis. The USFWS Great Lakes EDM Program is an adaptive management tool focused on invasive species detection.

### June 2025 Highlights

- Eighty-five Silver Carp (609 mm 1012 mm TL [Total Length]) and 4 Grass Carp (895 mm 947 mm TL) were captured in the Marseilles Pool during June 2025.
- No small-bodied (< 153 mm TL) invasive carp were captured by EDM in June 2025.</li>
- No large-bodied (≥ 153 mm TL) invasive carp were captured outside their known range by EDM in June 2025.

Table one summarizes the USFWS invasive carp EDM from June 2025 for each pool monitored under the project.

Table 1. Summary of USFWS EDM effort during June 2025.

_	Marseilles	Dresden Island	Kankakee	Brandon Road	Lockport
Electrofishing Effort (hours)	5	4	3.75	2.5	2.26
Electrofishing Sites	20	16	15	10	9
Dozer Trawl Effort (hours)	1.67	0.92	0	0	0
Dozer Trawl Sites	20	11	0	0	0
Mini-fyke Effort (net nights)	17.25	19.33	0	0	0
Gill Net Effort (yards)	0	0	0	0	0
Gill Net Sites	0	0	0	0	0
Small Carp Captured	0	0	0	0	0
Large Carp Captured	89	0	0	0	0
Species Richness	52	45	45	12	12
Total Catch	1391	1246	296	94	57
Most Abundant Species	Emerald Shiner	Gizzard Shad	Bluegill	Smallmouth Bass	Gizzard Shad

# MONITORING INVASIVE CARP REPRODUCTION IN THE ILLINOIS WATERWAY

**INHS** 

#### Introduction

This project monitors for invasive carp reproduction in the IWW and major tributaries (Kankakee, Fox, Vermilion, Mackinaw, Spoon, and Sangamon rivers). Ichthyoplankton sampling will be conducted to assess the extent, timing, and magnitude of invasive carp reproduction in the IWW, monitor for Black Carp reproduction, and quantify relationships between invasive carp adult abundance, reproductive output, and recruitment. Samples will be collected from late April through October, with more frequent sampling effort during periods when temperature and flow conditions are considered optimal for invasive carp spawning.

## June 2025 Highlights

INHS conducted monitoring for invasive carp reproduction from the Brandon Road to Alton pools during every week of June. Water temperatures in the Illinois River remained above 19°C during the entire month of June, surpassing 30°C during the last week of the month. Flows on the Illinois River never exceeded flood stage, but fluctuated considerably during June. Widespread precipitation resulted in pronounced increases in water levels starting on June 4-5. A single large-diameter egg was collected in a sample from the Marseilles Pool on June 4, and additional large eggs were identified from samples from the Peoria through Alton pools from June 5. Further large-diameter eggs were collected throughout the lower Illinois River on June 11. Additional rainfall caused another rise in water levels beginning on June 18-19. Low numbers of large-diameter eggs were identified in samples collected from the Marseilles Pool on June 19 and from the Starved Rock Pool on June 20. A special project to assess the temporal distribution of invasive carp spawning activity associated with flow pulses was conducted in the upper Peoria Pool during June 19-23, with samples also collected at both the surface and at 1.5-2.0 m depth within the water column each day to evaluate potential differences in density and species composition of invasive carp eggs between these depths. Some large-diameter eggs were collected each day during this effort. Processing of these samples is ongoing and results will be reported once available. Much of the invasive carp spawning during this time period may have occurred at tributary mouths, as mass spawning aggregations of invasive carp were observed by field crews at the mouth of the Mackinaw River on June 20 and the mouth of the Vermilion River on June 21. Low numbers of large eggs were collected in the lower Peoria through Alton pools during June 20-24, and large numbers of invasive carp larvae were observed in samples from the upper Alton Pool on June 24. Sample processing and identification of fish eggs and larvae is ongoing. Large eggs collected from upstream of Starved Rock L&D will be prioritized for staging and sequencing. Monitoring for invasive carp reproduction will occur weekly until mid-July and bi-weekly thereafter, except when river conditions warrant more frequent sampling. Occurrences of invasive carp eggs or larvae, particularly upstream of the Starved Rock Lock and Dam, will be reported as soon as this information is available.

## DES PLAINES RIVER AND OVERFLOW MONITORING

USFWS

# June 2025 Highlights

Agency did not submit an update for June 2025.

## SUMMARY OF THE TELEMETRY SUPPORT FOR THE SEICARP MODEL

USFWS

## June 2025 Highlights

Agency stated there were no updates for June 2025.

## TELEMETRY MONITORING PLAN

USACE

# June 2025 Highlights

Agency did not submit an update for June 2025.

### ALTERNATE PATHWAY SURVEILLANCE IN ILLINOIS - LAW ENFORCEMENT

**IL DNR** 

## June 2025 Highlights

ISU inspected three fee fishing areas in Northeastern Illinois as part of the IDNR's random commercial inspection program. The frequent restocking of fish at these locations increases the need to verify only legal species are being stocked in them. No deficiencies were found. ISU investigated a complaint of someone on Facebook unlawfully selling minnows, goldfish, and bluegill as bait. ISU continues to investigate a complaint of a fisherman unlawfully selling wild-caught largemouth bass and crappie on a social media website. ISU assisted an outside agency with an investigation of two Illinois residents suspected of catching white bass in another state and unlawfully selling them in Illinois.

# INVASIVE CARP POPULATION MODELING TO SUPPORT AN ADAPTIVE MANAGEMENT FRAMEWORK

USGS, USFWS

#### Introduction

This project will develop objective, data-driven models to inform decisions concerning invasive carp control efforts in the Illinois River. This project supports ongoing modeling efforts to provide recommendations about the magnitude and spatial allocation of fishing effort and deterrent barriers to reduce the risk of Silver Carp and Bighead Carp introduction and establishment in the Great Lakes.

## June 2025 Highlights

The modeling work group completed a soft launch of a graphical user interface for the SEICarP model to allow for easy use by managers. This tool is designed as a conversation starter prior to more intensive modeling efforts to inform management actions. The modeling work group also examined the potential effects of a lack of effort data on the utility of the statistical catch-at-age model.

## INVASIVE CARP STOCK ASSESSMENT IN THE ILLINOIS RIVER

IL DNR

# June 2025 Highlights

Agency did not submit an update for June 2025.

#### **BLACK CARP BOUNTY PROGRAM**

#### **ILDNR**

#### Introduction

In 2015, the Black Carp Bounty Program was created to increase the number of black carp specimens made available for research to provide improved information on the status and characteristics of these carp in the Mississippi River and its tributaries. Knowledge of black carp geographic distribution, population characteristics, and diet are needed to inform development of management strategies to control black carp abundance, impacts, and further range expansion.

Nearly all black carp detected in the Mississippi River and tributaries are caught and reported by commercial fishers, largely due to the difficulty in sampling black carp in large rivers and limited agency and university sampling efforts focused on this species. The Black Carp Bounty Program was created to provide a reward of \$100 per fish to provide incentive for commercial fishers to target black carp in the wild, report any black carp that they catch to agency biologists, and donate the fish for black carp research.

## June 2025 Highlights

The table below summarizes the total number of Black carps caught since transition of the program from Southern Illinois University to IDNR to Tetra Tech.

Month # of Fis				
2023 *	11			
2024	116			
2025 Part Year				
January	10			
February	6			
March	4			
April	9			
Мау	20			
June	15			
2025 Subtotal	64			
GRAND TOTALS	191			

<sup>\*</sup> Records start July 1, 2023.

#### ENHANCED DETECTION OF BLACK CARP IN THE LOWER ILLINOIS RIVER

IL DNR/INHS-IRBS

#### Introduction

Exotic black carp *Mylopharyngodon piceus* have invaded the Illinois River system and have been recently captured in the Alton, La Grange, and Peoria reaches of the lower Illinois River. Currently, the invasion of black carp is represented by only a few reported individuals and little is known about the size of the population or potential scope of ecosystem changes that may result from the invasion. The Illinois Department of Natural Resources (IDNR) has been closely monitoring the range expansion of black carp up the Illinois River, despite limited catches reported to date.

Critical to any inferences made about the range expansion of black carp is better knowledge of their population levels in invaded reaches. The limited number of black carp reported have been from incidental commercial fishermen catches while targeting other species (e.g., bighead carp, silver carp, common carp, grass carp, buffalo spp., catfish spp.). These captures and associated data (e.g., length, weight, age, diet, otolith microchemistry.) are valuable, but the limited number of reported individuals makes it difficult to assess their prevalence/establishment in the lower Illinois River. More robust estimates of the current population level are essential to management and potential control of black carp in the Illinois River.

## June 2025 Highlights

We have begun sampling on the Alton Reach of the Illinois River with a sampling time frame of June 15-October 31 for this current year. During the month of June, we sampled 20 sites consisting of 40 total hoop nets. Each site contains a paired hoop (one small hoop net and one large hoop net) net sampling design following Long-Term Resource Monitoring protocols. Each sampling site is determined by using a random site generation approach following three criteria. Site criteria are based on black carp capture habitat data which consist of locations greater than 12 feet of depth or outer bends within the river dynamics or within 300 meters of a known mussel bed for the main-channel and increased side-channel prevalence. Each paired hoop net is baited with clams, cottonseed-based bait, or left unbaited following what previous commercial and agency efforts have found to capture black carp. Thus far we have not captured any black carp during these efforts.