

MULTIPLE AGENCY MONITORING OF THE ILLINOIS RIVER

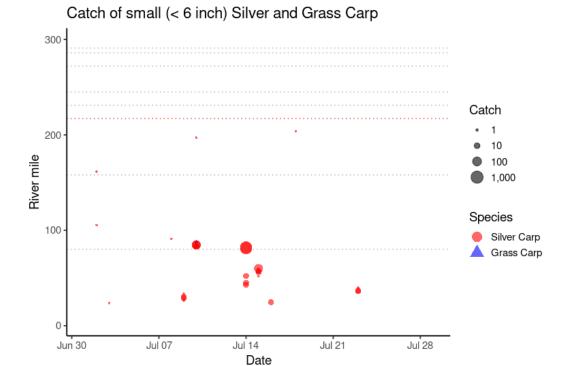
IL DNR/USFWS/INHS

July 2025 Highlights

Small (< 6 inch) carp caught during July

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
Marseilles	0	0
Fox River	0	0
Starved Rock	0	0
Peoria	3	0
La Grange	2,224	1
Alton	206	0





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

Sampling sites completed during July

-	E-fish	Fyke net	Hoop net	Mini-fyke net	Trawl	Dozer trawl
Lockport	2	0	0	8	0	1
Brandon Road	11	0	0	4	0	0
Dresden Island	36	4	14	18	0	0
Carp-Likely (DR/KK)	15	0	0	0	0	0
Marseilles	28	4	14	12	0	0
Fox River	0	0	0	0	0	5
Starved Rock	32	4	14	12	0	16
Peoria	30	4	7	18	0	16
La Grange	24	11	14	24	4	20
Alton	20	0	12	10	0	16

CONTRACTED COMMERCIAL FISHING BELOW THE ELECTRIC DISPERSAL BARRIER

IL DNR

July 2025 Highlights

BARRIER MAINTENANCE AND FISH SUPPRESSION

IL DNR, USACE

July 2025 Highlights

SUMMARY EVALUATION OF BIO-ACOUSTIC FISH FENCE DETERRENT

USFWS, USGS

July 2025 Highlights

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 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, 68 fishers have entered into contracts to catch invasive carp from these pools, with 32 currently under contract. (The number of contracted fishers dropped from June (50 fishers) due to new contract start in July. The number of contracted fishers expected to increase.) From inception through June 2025, 30,334,631 pounds of invasive carp have been caught among all three pools. Of these total catches, 2.72% are Bighead, 87.62% are Silver, and 9.66% are Grass carp.

July 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	864,539	10,480	837,906	16,153
June	387,079	5,608	357,547	23,924
July	432,323	2,130	388,310	41,883
2025 Part Year Subtotal	3,592,087	28,255	3,310,522	253,310
GRAND TOTALS	30,334,631	825,580	26,579,217	2,929,834

^{*} September 2019 program inception.

^{**} No Black carp reported as these are reported through the Black Carp Bounty Program.

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.

July 2025 Highlights

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

- Hydroacoustic barrier scan on July 7th, 2025, identified a total of 20 targets (4 targets within the EDBS and 16 targets immediately downstream of the barrier). An average of 6.67 ± 5.69 targets were detected during the three replicate surveys. The mean target length was 19.1 inches ± 7.5 inches.
- Figure 1 shows the average targets detected across all three replicate surveys.
- No hydroacoustic pool scans were completed in the month of July.

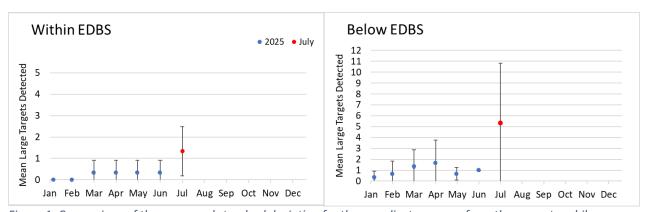


Figure 1. Comparison of the mean and standard deviation for three replicate surveys from the current mobile surveys with previous surveys from 2025.

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.

July 2025 Highlights

- One hundred ten Silver Carp (547 mm 991 mm TL [Total Length]) were captured in the Marseilles Pool during July 2025.
- Two Silver Carp (918 mm & 951 mm TL) were captured in the Dresden Island Pool during July 2025.
- Five Silver Carp (880 mm 967 mm TL [Total Length]) were captured in the Lower Kankakee River during July 2025.
- No small-bodied (< 153 mm TL) invasive carp were captured by EDM in July 2025.
- No large-bodied (≥ 153 mm TL) invasive carp were captured outside their known range by EDM in July 2025.

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

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

_	Marseilles	Dresden Island	Kankakee	Brandon Road	Lockport
Electrofishing Effort (hours)	5.03	3.75	3.75	2.5	2.25
Electrofishing Sites	20	15	15	10	9
Dozer Trawl Effort (hours)	1.67	1	1.25	0	0
Dozer Trawl Sites	20	12	15	0	0
Mini-fyke Effort (net nights)	19.41	20.21	14.77	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	110	2	5	0	0
Species Richness	47	48	43	14	13
Total Catch	9603	39106	3150	393	296
Most Abundant Species	Bluegill	Gizzard Shad < 6 inches	Bluegill	Gizzard Shad	Gizzard Shad < 6 inches

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.

July 2025 Highlights

INHS conducted monitoring for invasive carp reproduction from the Brandon Road to Alton pools during the first two weeks of July and the week of July 21. Additional sampling was conducted in major tributaries of the Illinois River (Kankakee, Fox, Vermilion, Mackinaw, Spoon, Sangamon rivers). Ichthyoplankton monitoring from previous years indicates that the likelihood of invasive carp spawning diminishes considerably after mid-July, so routine sampling is usually conducted bi-weekly after the second week of July, unless hydrologic conditions or real-time telemetry information suggests the potential for invasive carp spawning is high. Water temperatures in the Illinois River remained above 26°C during the entire month of July. Despite frequent, widespread storms that produced heavy precipitation in some areas, water levels in the upper Illinois River were remarkably stable during July. Modest increases in discharge occurred in the lower Illinois River and its tributaries during mid-July, although these changes in flows do not appear to have triggered detectable invasive carp spawning events. Substantial rainfall occurred across the lower Illinois River towards the end of the week of July 21, resulting in a large rise in water levels in LaGrange Pool tributaries. Additional sampling was conducted in the LaGrange and Alton Pools on July 29. Extremely high densities of invasive carp eggs were collected in the Spoon River at this time, with considerable numbers of eggs also found in the mainstem Illinois River downstream of the Spoon River. Large numbers of invasive carp larvae were also collected in the lower LaGrange and upper Alton pools. Sample processing and identification of fish eggs and larvae is ongoing. Monitoring for invasive carp reproduction will occur bi-weekly through early October, 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 OVERFLOW MONITORING

USFWS

July 2025 Highlights

JULY SUMMARY OF THE TELEMETRY SUPPORT FOR THE SEICARP MODEL

USFWS

Introduction

This project provides support for the inter-agency telemetry array deployed in the Illinois River basin. The 2025 plan of work for USFWS placed 150 acoustic transmitters in Silver Carp and Bighead Carp across the Peoria, Starved Rock, and Marseilles Pools. Forty-five of these tags were implanted in bigheaded carps in Marseilles Pool to support detection efforts by agency partners outside USFWS. USFWS maintained 18 receivers across the Peoria and Starved Rock Pools in 2024. In 2025, two additional receivers were added to Starved Rock Pool. The data gained from the additional tagged fish and additional receivers will improve the accuracy of MRWG modeling work, allowing improved estimates of current levels of exploitation and bolstering estimates of large-scale pool-to-pool movement. The receiver names and locations in the telemetry array are listed in table 1 and figure 1.

April-July 2025 Highlights

- USFWS continued to maintain receivers and download the data collected from the receivers
 from the telemetry array in the Peoria and Starved Rock pools July 21st-25th. The data on
 receivers covered periods from March 3, 2025, to the respective receiver's collection date. The
 data was added to the USFWS telemetry database and United States Geological Survey's
 Riverine Acoustic Fish Tracking (RAFT) database on July 31st.
- Nine out of 13 receivers in the Peoria Pool were range tested from July 21st-25th
- All receiver logs submitted to the Riverine Acoustic Fish Tracking (RAFT) database on August 1, 2025.
- The Carterville Fish and Wildlife Conservation office is currently working on an R- script that will summarize the movement data within the telemetry array. The data will be fully summarized in the next reports.

Receiver	Receiver	Station Name
Number		
1	VR2Tx-489204	RM164.8 Lower Peoria Lake Point River Left
2	VR2Tx-489205	RM166.6 Peoria Lake Narrows
3	VR2W-137065	RM173 Upper Peoria Lake River Right
4	VR2Tx-489207	RM173 Upper Peoria Lake River Left
5	VR2Tx-489206	RM182.4 US Chilli Bridge Peninsula
6	VR2W-137064	RM188.1 DS Lacon MC Sawyer Slough
7	VR2Tx-489208	RM194.8 US Upper Henry Island
8	VR2Tx-489209	RM199.1 Senachwine Lake Peninsula
9	VR2Tx-489211	RM202.7 Lower Twin Sisters Island
10	VR2W-137066	RM211 MC Near Depue Lake Channel
11	VR2Tx-489039	RM216 US of Clark Island
12	VR2W-129785	RM219.8 US Spring Valley River Left
13	VR2Tx-489037	RM223 Peru US Route 251 Bridge
14	VR2Tx-489212	RM233.9 Lone Point Delbridge Side Channel
15	VR2Tx-490949	RM235.1 MC Sheehan Island
16	VR2Tx-490940	RM238.5 Hitt-Mayo Straight
17	VR2Tx-490950	RM241 Bulls Island MC Abandoned Harbor
18	VR2Tx-491939	RM243 US of Heritage Harbor River Left
19	VR2W-129787	RM239.8 Fox River-US Illinois River Confluence
20	VR2Tx-491940	RM 241 Fox River-US Rt.6 Bridge

Table 1. Receiver deployments and summary of detections from March-July. "US" denotes "upstream", "DS" denotes "downstream", "MC" denotes "main channel", and "RM" denotes "river mile". River mile is denoted for the Fox River receivers in relation to their longitudinal location along the Illinois River. Receiver number references its location in the map in figure 1.



Figure 1. USFWS Wilmington receiver placements in Peoria and Starved Rock Pools. The numbers reference the receiver's name and location in table 1.

TELEMETRY MONITORING PLAN

USACE

July 2025 Highlights

ALTERNATE PATHWAY SURVEILLANCE IN ILLINOIS - LAW ENFORCEMENT

IL DNR

July 2025 Highlights

Two aquarium/pond supply companies, located in Georgia and Texas, received citations for illegally selling and shipping live IDNR-injurious aquatic plant species into Illinois. Both businesses were previously provided IDNR aquatic invasive species regulations in 2024, including the Great Lakes St. Lawrence Governors and Premiers' Least Wanted Aquatic Invasive Species List. Yellow floating heart, Brazilian elodea, and Parrot feather were the three products confiscated as evidence during the investigations, despite website claims that the products would not be sold or shipped to Illinois and other states with similar prohibitions. ISU inspected a retail minnow dealer in Lake County, IL, as part of the IDNR random commercial inspection program. A review of business records and the facility inspection did not reveal any deficiencies.







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.

July 2025 Highlights

The modeling work group is working on the development of a simplified statistical catch-at-age model that may allow for estimation of population size and other population characteristics without needing inputs such as the stock-recruit relationship which will likely never be known with a high degree of certainty.

INVASIVE CARP STOCK ASSESSMENT IN THE ILLINOIS RIVER

IL DNR

July 2025 Highlights

BLACK CARP BOUNTY PROGRAM

II DNR

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.

July 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 Fish
2023 *	11
2024	116
2025 Part Year	
January	10
February	6
March	4
April	9
May	20
June	15
July	21
2025 Subtotal	85
GRAND TOTALS	212

^{*} 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.

July 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 July, we sampled 45 sites consisting of 90 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.