



US Army Corps
of Engineers
Chicago District

Asian Carp Monitoring Fact Sheet

Electrofishing

Chicago Sanitary and Ship Canal – Electric Barriers

Overview:

Electrofishing is a monitoring tool that uses an electric current in water, emitted from individuals holding the apparatus in a boat, to temporarily stun fish, so they float to the surface allowing scientists to identify them.

Electrofishing is used by the Asian Carp Regional Coordinating Committee's Monitoring and Response Work Group, as part of their overall monitoring plan. The objective of the biweekly sampling is to determine the risk to and effectiveness of the electric barriers by both bighead and silver carp.

Electrofishing is conducted both above and below the barriers in the Lockport and Brandon Road navigational pools, specifically in the Chicago Sanitary and Ship Canal, Illinois and Michigan Canal and the Des Plaines River.

Electrofishing results in either a visual sighting or capture of an Asian carp, both of which are considered detections in the monitoring plan.

Scope:

USACE electrofishing efforts are focused on areas within the vicinity of the Lockport Lock and Dam and the barriers ranging from River Mile (RM) 286 to RM 305. Boat electrofishing includes a 5,000 watt or larger AC or pulsed DC generator standardized to yield 3,000 watts (depending on the conductivity and temperature of the water). Sampling occurs March through December in accordance with the risk-level schedule in the monitoring plan.

Additional electrofishing will be conducted throughout the Chicago Area Waterway System (CAWS) as directed in the monitoring plan by the following state and federal governmental agencies: USACE (Chicago and Rock Island districts), Illinois Dept. of Natural Resources, and U.S. Fish and Wildlife Service (La Crosse, Wis. and Cartersville, Ill).

Results:

No Asian carp have been detected above the electric barriers to date using electrofishing. Weekly reporting of combined interagency electrofishing efforts and results are posted online at www.asiancarp.us.



Illinois River bighead carp (top) and silver carp (bottom)



Electrofishing in the Chicago Sanitary and Ship Canal

Benefits to continued monitoring:

Electrofishing continues to be a key monitoring tool in determining fishery population abundance and composition within the CAWS. Monitoring field data helps determine the nature of downstream populations, monitor for the presence of Asian carp above the barriers and inform analysis of the effectiveness of the barriers.

Authority:

The Water Resources Development Act of 2007, Section 3061, Chicago Sanitary and Ship Canal Dispersal Barriers Project, Illinois, authorized this project.

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