

# Asian Carp Background and Threat

Asian Carp  
Information Meeting  
October 27, 2025

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Watts Bar Ecology and Fishery Council Chairman



## There Are Four Species of Asian carp:



Silver carp are filter feeders of planktons, which are necessary food sources for larval fish and native mussels.



Bighead carp are filter feeders of planktons, which are necessary food sources for larval fish and native mussels.

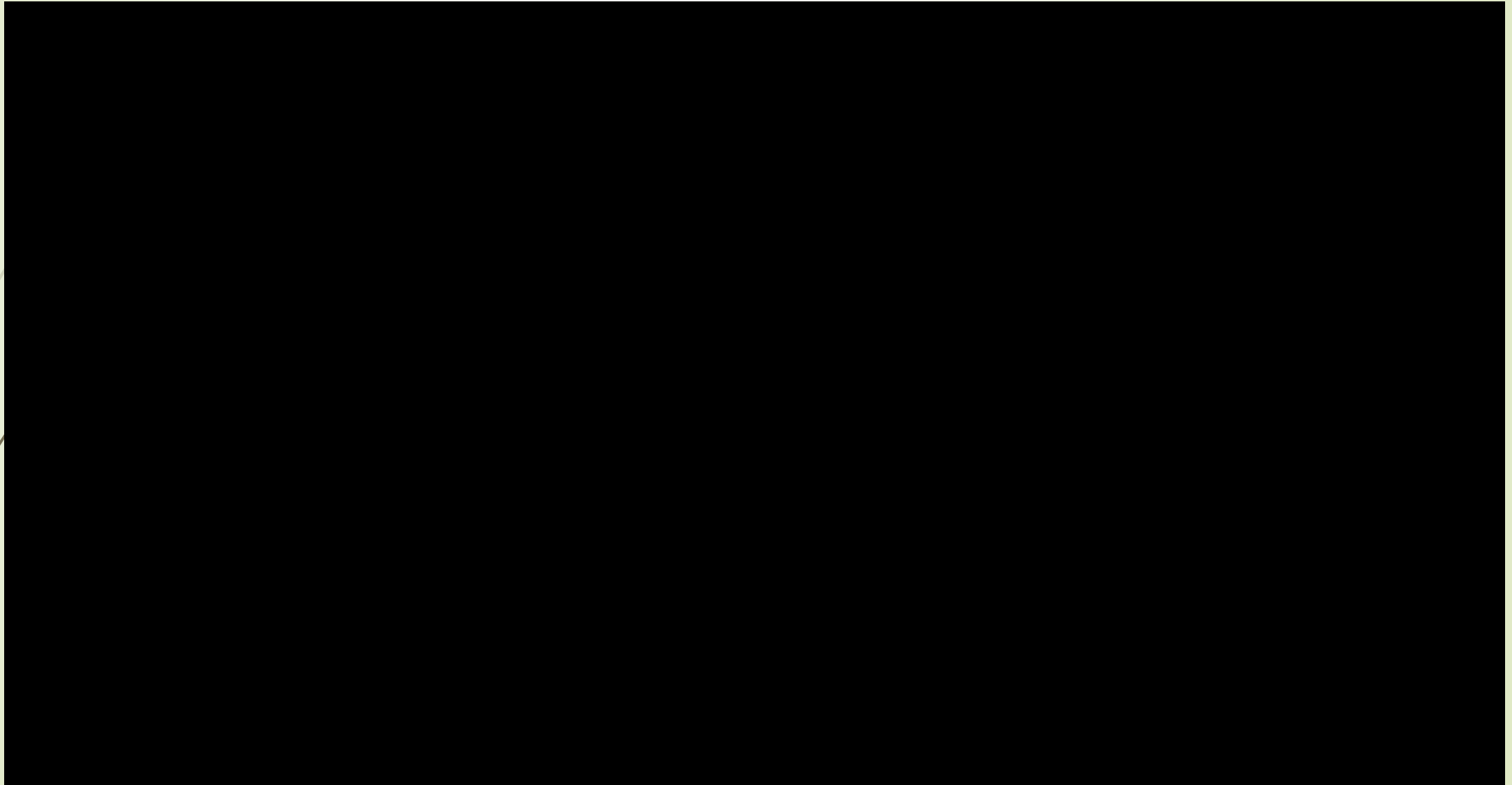


Black carp are carnivorous and feed on native mussels and snails some of which can be endangered.



Grass carp are herbivores that feed on aquatic plants and can alter the food webs of a new environment by altering the communities of vegetations, invertebrates and fish.

# Asian Silver Carp In Action

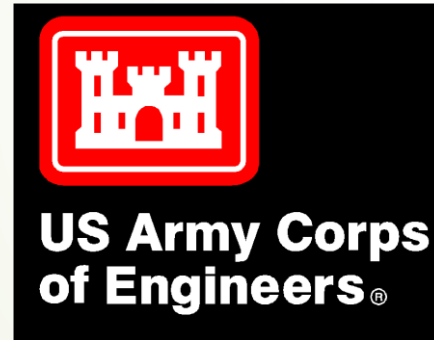


## Asian Silver Carp Facts

- Mature in 2-3 years and can live 20 years or more.
- Can filter out 20-40% of their body weight each day.
- Can grow to over 4 feet in length and weigh 75 lbs.
- Silver carp can jump 9 feet or more out of the water when startled by boat engines.
- A large mature female can lay 4-5 million eggs each year.



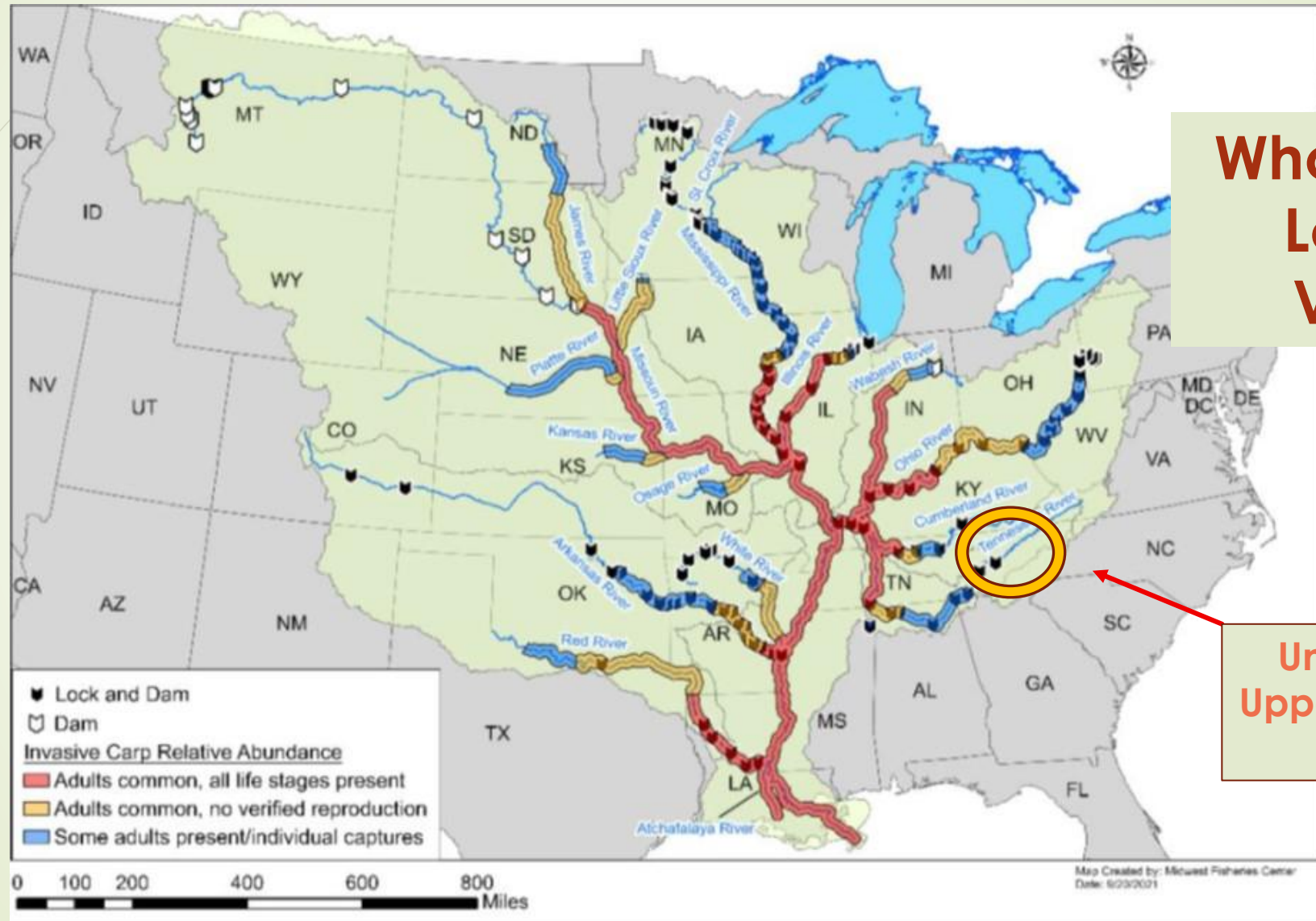
# Key Asian Carp Events



**BRANDON ROAD  
INTERBASIN PROJECT**



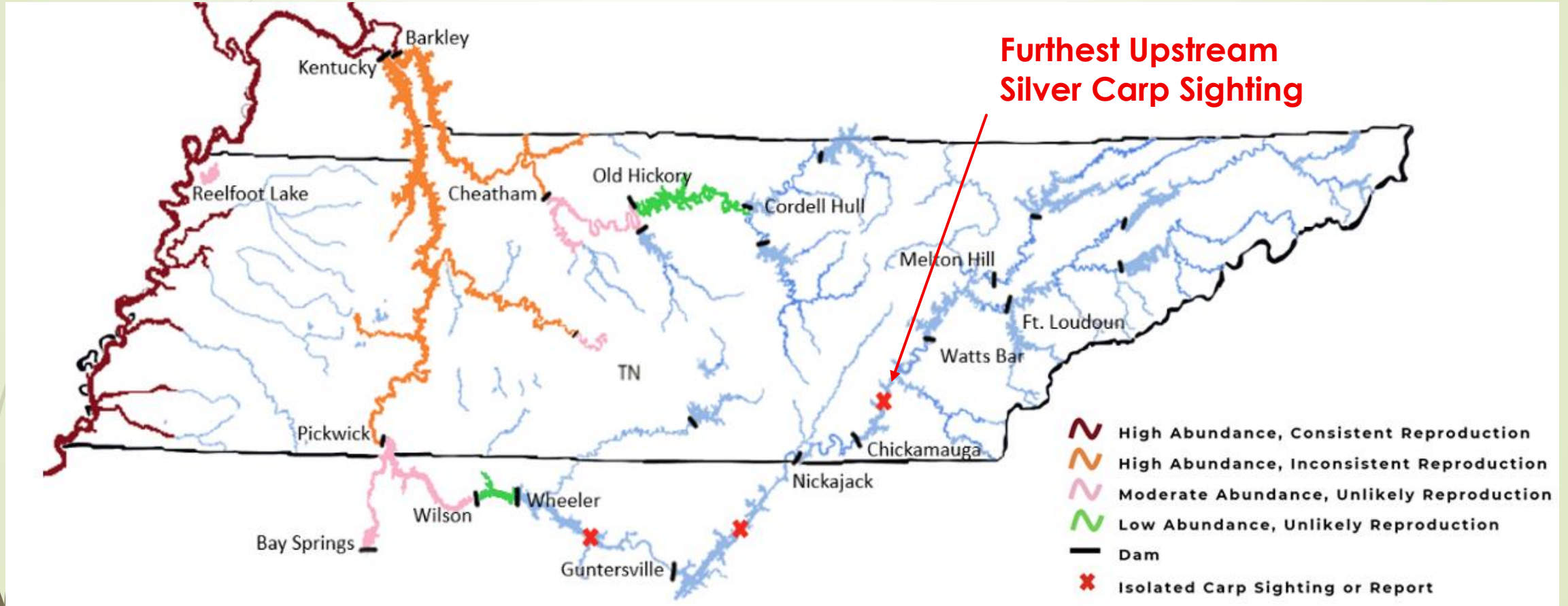
# Silver Carp National Distribution



Who Has the Loudest Voice?

Uninvaded Upper TN River Basin

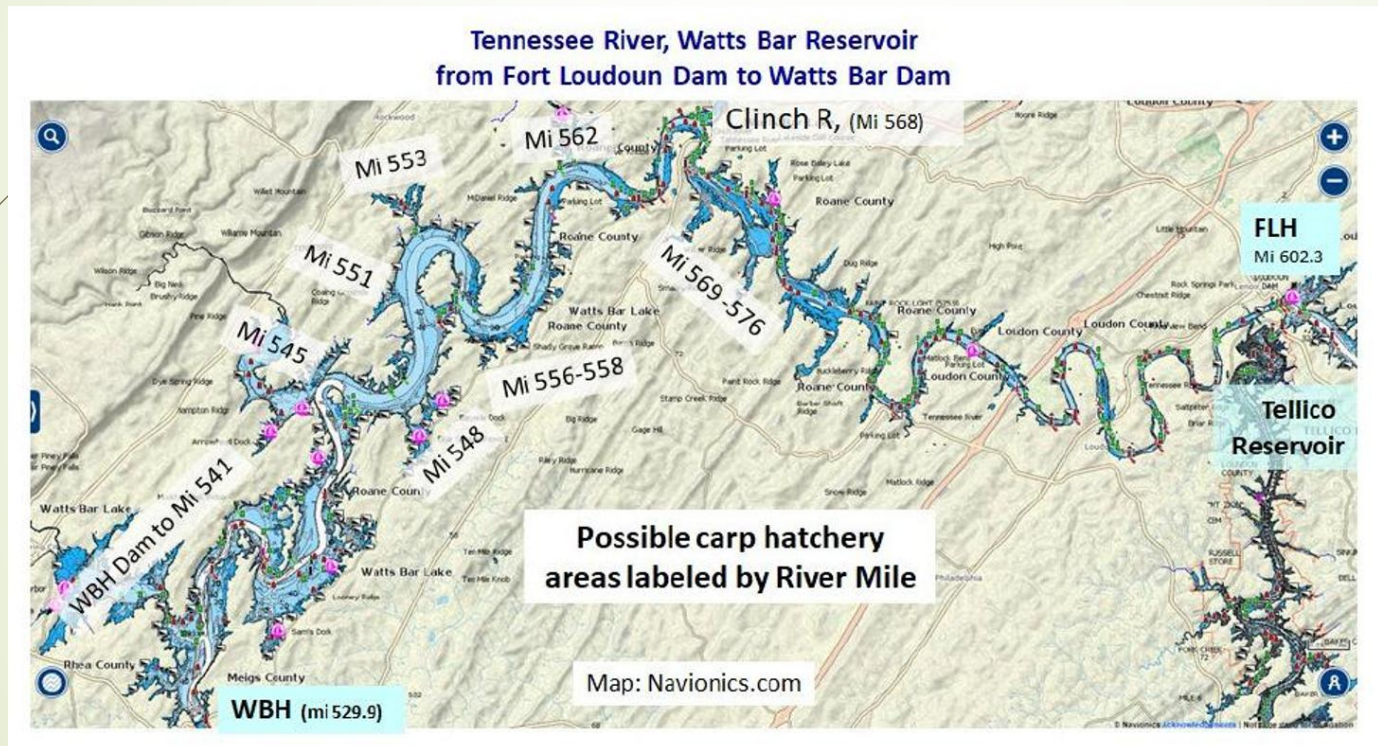
# Known Distribution of Silver Carp In Tennessee



Map from TWRA Website

## USGS 192-page FluEgg model

“The FluEgg model shows that the temperature, flow regimens and backwater nursery areas for Chickamauga, Watts Bar, Melton Hill, Fort Loudon and Tellico lake fully support silver carp reproduction. Therefore, there is no question that these lakes provide ideal conditions for successful spawning of the silver carp. Watts Bar Lake has quite a bit of accessible potential nursery habitat for silver carp hatchlings.”



**Silver Carp  
WILL  
Reproduce**

**Species Diversity and Game Fish Devastated By Asian Carp**

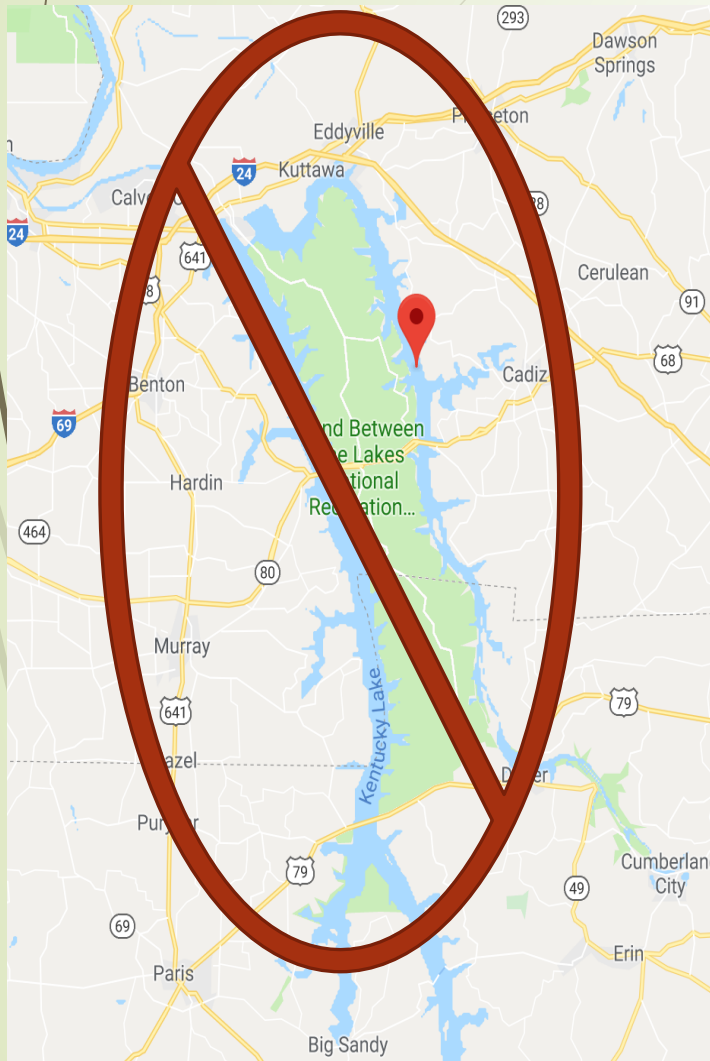
# U.S. Fish and Wildlife Service Silver Carp Guidance

(2007 Working group of 30 professionals)

- ▶ Goal 1: Prevent accidental and deliberate unauthorized introductions of silver carp in the U.S. Active control measures are needed to prevent introductions or range extensions.
- ▶ Goal 2: Contain and control the expansion of . . . silver carp . . . . Contain existing populations and prevent their spread . . .

**The only way to protect the upper TN River lakes is to follow the USFWS guidance and “Prevent” the Asian carp from entering the lakes.**

## Kentucky Lake Barkley Lake



# What Happens If We Don't Act - Land Between the Lakes

Allan Brown, U.S. Fish and Wildlife Service Assistant Regional Director Said:

- “The silver carp population has ballooned to unmanageable numbers. Here in Kentucky, sport fishing is gone. The groups that historically flocked to the lakes for vacation have dwindled.”
- Millions of pounds of carp removed by subsidizing commercial fishing.
- Repopulated quickly – one female lays 4-5 million eggs.
- Insignificant/no benefit to lake ecology or economic recovery.
- Subsidizing Commercial fishing will have to continue for the foreseeable future at significant cost.

Senator Mitch McConnell said “The economic impact of fishing in Western Kentucky is estimated at \$1.2 billion”.

**There is no going back, recovery is impossible.**

# Threat of Injury / Fatality from Jumping Silver Carp

## After Carp Invasion



Silver Carp Impact  
= Broken Jaw



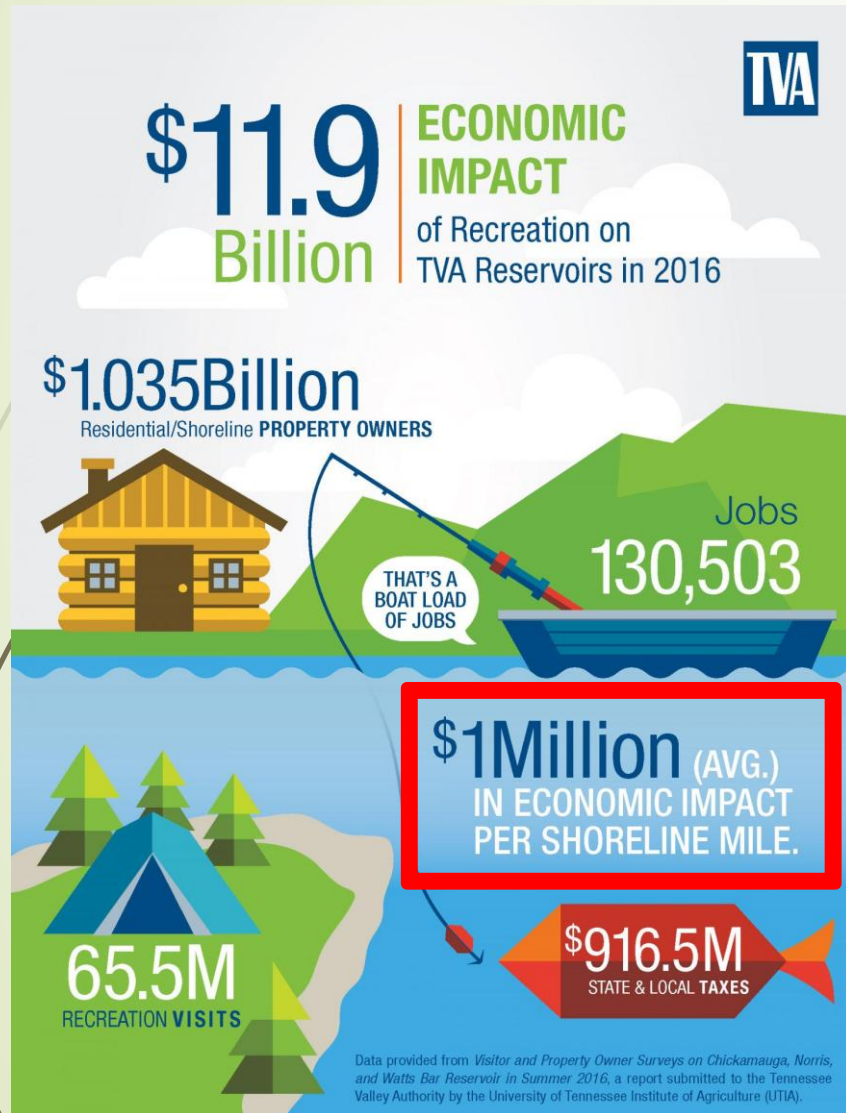
## Recreational Watercraft Operation Dangerous

Crews will no longer train in Oak Ridge

Fishing Tournaments gone



# Economic Impact of Recreation On TVA Reservoirs and Cumberland River



Using the economic revenue data from the TVA report prepared by the UT Institute of Agriculture escalated to 2025 (~35%) the economic impact is estimated to be

**\$1.35 M/Shoreline Mile**

	Shoreline Miles	Impact \$B
TVA System	10,720	14.5
Cumberland River	3,800	5.1
Total	14,520	19.6

**Total Recreational  
Economic Impact  
Almost \$20 B**

# Economic Risk from Silver Carp Invasion for Counties Bordering Upper East Tennessee Lakes

- Based on the escalated data from the TVA and UTIA report and the shoreline miles in each county.
- The estimated recreational economic revenue by county that is at risk is shown.

WBEFC is currently working with a UT-Grad Student to further evaluate the TVA-UTIA report estimates.

## Estimated Annual Recreational Economic Impact \$ M

Roane	500
Loudon	419
Knox	329
Rhea	243
Monroe	232
Anderson	163
Meigs	145
<u>Blount</u>	<u>153</u>
Total	2,184

> \$ 2 Billion  
at Risk !!!



## Silver Carp Experts Agree

- ▶ **The most cost-effective management approach is preventing the introduction and establishment of Asian carp.**
  - ▶ **Prevention efforts are more viable than attempting to manage and control a species that has already been introduced.**
  - ▶ **Blockage of upstream movements is the only sound ecological option available to keep the Upper TN River Basin Asian carp free.**
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