



FISHERIES STREAMS AND RIVERS NEWSLETTER

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The Stream Fisheries Program provides high-quality fisheries information for management purposes and applies the results of research to improve fish populations, habitat, and fishing.

Pallid sturgeon are a federally-listed endangered species. Within Arkansas, they are only known to occur in the Mississippi River. Every year the U.S. Army Corps of Engineers request feedback from Arkansas Game and Fish Commission biologists concerning new wing dikes and rock revetments they plan to construct on the Mississippi River. In the past, we basically did not know what to tell the Corps, because we had little data concerning pallid sturgeon habitat use. Therefore, we initiated studies in January to implant pallid sturgeon with ultrasonic transmitters. The transmitters will allow us to track the fish to determine their “honey holes,” after which we can advise the Corps of the spatial locations of habitats they should avoid impacting.

The issue is that pallid sturgeons are rare and very difficult to catch. We surmise that out of 100 sturgeon caught, on average, only two will be pallid sturgeon. Therefore, it takes a concerted effort to find the fish we need to study.

AGFC biologists are cooperating with several partners in this project, including biologists from several states and federal agencies. During January everyone converged for the first-ever pallid sturgeon “rodeo.”

We constructed six trotline jump boxes and trotlines, which are the preferred tackle for capturing pallid sturgeon. In addition, we used gill nets to capture sturgeon.



Above: High winds developed during sampling.

The weather was terrible during our sampling. High winds the first day, and sleet the third day, resulted in the entire partnership capturing only two pallid sturgeon. We did manage to implant transmitters into five shovelnose sturgeon.



Above: Mississippi River shovelnose sturgeon

Veterinarians from the University of Georgia came and demonstrated the best surgical techniques for implanting transmitters into fish. They injected a saline solution into the body cavity, which I have never done during a fish surgery. They had an endoscope (\$20,000) that allowed visualization of the gonads and accurate determination of sex.



Above: endoscopy on a shovelnose sturgeon



Above: the mobile surgery center

In January, Bob Limbird and I had a paper accepted to the upcoming Reservoir Symposium book. The book chapter is about long-term trends in the Arkansas River fishery

In February, I wrote a report on the sampling of Bayou Meto. I was assigned to sample Bayou Meto every year to document long-term changes in the fisheries of this river. Bayou Meto (a delta river) is being restored by the Conservation Reserve Enhancement Program (CREP) farm bill program. Riparian buffers are going to be restored along the river. So far, we have collected 2,447 fishes from 49 species during five years of sampling.

During the winter, I revised two chapters for the upcoming paddlefish book: one paper documents harvests at special commercial fishing seasons, and the other is a telemetry study on the paddlefish population of Ozark Lake.

I presided as the Chair of the Warmwater Streams Committee at the Southern Division of the American Fisheries Society meeting in Wheeling, West Virginia. I also attended a side-scan sonar workshop at the meeting.

Alligator gar sampling is an ongoing work task for the Stream Fisheries Program. I am assisting on two different projects that investigate alligator gar on West Fork Mill Creek, in Perry County, and on the lower White River.

Other Duties...

- I attended an Arkansas River standardized sampling procedures team meeting.
- I attended the Fisheries Staff meeting at Russellville.
- I worked on revisions of the Catfish Management Plan.
- I took one week of vacation.
- I attended the Arkansas Natural Resources Commission meeting concerning minimum stream flows.
- I edited Ben Batten's thesis for his master's program.
- Contracts were written to have AGFC cost-share the streamflow gage for the Middle Fork of the Saline River.
- I reviewed applications for the Jimmy Pigg Award.
- I attended the MICRA Paddlefish and Sturgeon Committee meeting in Nashville.