

Freshwater Fisheries Report – June 2023

Freshwater Fisheries - Stock Assessment

Eastern Region Freshwater Fisheries Staff completed the annual electrofishing survey of Conowingo Reservoir this month. Although data are collected on all species, the survey is designed to assess black bass populations. Final data analysis is pending, but the catch was dominated by smallmouth bass and included a very impressive adult bass in the 18-20 inch range. Largemouth bass were also caught in good numbers. Many schools of largemouth bass fry were observed swimming along the shorelines during the survey.



Left- A beautiful smallmouth bass collected from Conowingo Reservoir

Right- A tank full of small and largemouth bass collected from a sampling station on Conowingo Reservoir

Eastern Region Freshwater Fisheries staff completed an assessment of an impoundment located at Idylwild Wildlife Management Area. There are several impoundments located on the property, all of which are popular with anglers. The largest experienced a significant fish mortality event this winter caused by a bacterial infection. Surprisingly, the impoundment still contains very good numbers of largemouth bass, bluegill, chain pickerel, and black crappie. Many thanks to the Regional Wildlife and Heritage staff who assisted with deployment of the electrofishing boat in the remote area and the survey itself.



Left- Wildlife and Heritage staff with a large chain pickerel

Right- Large bluegill collected from Idylwild's largest impoundment

Central Region staff conducted multiple seine surveys of small ponds in Howard County and Baltimore County to assess largemouth bass and sunfish population balance.

Central Region staff conducted a two night electrofishing survey on Little Seneca Lake in Montgomery County. Fourteen total sites were sampled to assess largemouth bass, northern snakehead, and panfish populations in the lake.

Central Region staff conducted an electrofishing survey in conjunction with volunteers from the Patapsco Valley Chapter of Trout Unlimited and Stevenson University students to evaluate the efficacy of Whitlock-Vibert boxes. Staff collected numerous young of the year rainbow trout from a 300 meter section of an unnamed tributary to the South Branch Patapsco River. In November of 2022, rainbow trout eggs were placed in Whitlock-Vibert boxes and installed in the substrate. The survey revealed that these Whitlock-Vibert boxes may be a viable method to re-establish trout populations in areas where they have been previously extirpated.

Southern Region staff conducted a survey of the sunfish population in Wheatley Lake. While sunfish population indices appeared to have improved slightly compared to 2022 data, additional surveys may be conducted to further characterize the sunfish population in the lake.

West Region I staff attempted to conduct a mark-recapture bass population estimate on Herrington Lake in Garrett County. During the initial marking run, the heavy vegetation caused a mechanical failure on the standard electrofishing boat. A follow-up attempt to mark bass was made using a smaller electrofishing boat, but the unit was not powerful enough to collect a representative sample. Staff were able to collect a few individuals that included multiple size classes of largemouth bass and quality crappie and bluegill. While electrofishing, numerous panfish of various sizes were also observed. Despite the difficulties of completing the formal survey, staff agreed that the fishery has rebounded since the lake was drained.

West Region I staff conducted the second year of a mark-recapture PIT tagging study on the North Branch of the Potomac River, Catch and Release All Tackle Management Area. The survey went very well, with good catch rates of both brown and rainbow trout that included large specimens of each species. A total of five trout were recaptured from the 2022 tagging effort, providing some initial glimpses into growth rates on the river. During this survey, 225 additional trout were tagged with PIT tags. This work is part of a multiple-year effort; data analyses regarding growth and mortality are forthcoming. Of note is the prevalence of hooking injuries sustained by trout in the river. The injuries ranged from small tears in the skin to severe deformities.





Trophy brown trout collected by electrofishing from the North Branch Potomac River (top) and rainbow trout with a severe hooking injury (bottom).

West Region I staff were notified of a fish kill on Lake Habeeb over the weekend of June 3. Staff were able to visit the lake shortly after and verify the reports. Staff were able to observe dead fish along the shore and with the use of an electrofishing boat, collected live specimens with visible skin lesions that were sent for testing. Bluegill were the only species affected and were later diagnosed by the Cooperative Oxford Laboratory with a bacterial pathogen - *Aeromonas hydrophila* -.

Western Region I staff conducted site inspections of the North Branch Potomac River/Potomac River near Paw Paw, West Virginia following a recent fish kill report in the South Branch Potomac River by the West Virginia Division of Natural Resources. Staff checked the river from Paw Paw to Cumberland and did not observe anything of concern.

Western Region I staff continues to collect and enter Deep Creek Lake creel data from angler interviews.

Western Region II trout surveys were conducted in Fishing Creek, Owens Creek, and Clifford Branch in Frederick County. Brook trout abundance was considered to be good; juvenile brook trout were also abundant at all sites, documenting successful recruitment. Brown trout numbers also looked good at stations on Little Hunting Creek. Additional surveys will be conducted in trout streams in Washington County through the summer.

Roughly 15,000 juvenile smallmouth bass produced from the Manning Hatchery were stocked in the upper Potomac River at Brunswick, Point of Rocks, and Whites Ferry (photo at left). These fish will help supplement natural recruitment in the river.



Supplemental stockings have been occurring since 2019 in an effort to rebuild the depleted smallmouth stock. Additional monitoring work this fall will help determine stocking contribution to the overall smallmouth bass fishery. A small number of juveniles are also being held at the hatchery and in cages in the river to check post-stocking survival and fish health.

Freshwater Fisheries - Habitat and Water Quality

Western Region I staff calibrated and placed a new HOBO temperature logger at the McCoolle site after discovering one had been stolen. This particular temperature logger is for recording air temperature through the summer monitoring period.

Central Region staff trained the Potomac Patuxent Chapter of Trout Unlimited to calibrate and use dissolved oxygen monitoring instruments. The Chapter will be monitoring dissolved oxygen levels in the Patuxent tailwater below Triadelphia Reservoir during the summer.

Environmental Review - Provided aquatic resource information for the following environmental review projects:

An application was reviewed for a pond rehabilitation project to take place in Oakland, Maryland. The project consists of clearing trees on the embankment and emergency spillway along with replacing the principal spillway. Comments were provided for time of year closures, minimal disturbance, water diversions, soil stabilization, material storage areas, and site planting upon the completion of the project.

Comments were made on an application submitted for a gas line upgrade in Frostburg, Maryland. Recommendations were made on minimal floodplain disturbance, sediment and erosion control, material/equipment storage areas, and planting of vegetation at the completion of the project.

Western Region I staff reviewed reclamation plans for three new coal mines to be opened in Garrett and Allegany counties. Along with the reviews, site visits were conducted at each mine location to determine how they will be set up, phases of operation, and to see their locations in order to make recommendations for natural resource protection.

Western Region I staff provided comments on three proposed Project Open Space properties. Staff will evaluate the properties and provide comments for fish resource protection and potential fishing access..

Freshwater Fisheries - Stocking and Population Management

Western Region I staff assisted Bear Creek Hatchery in stocking rainbow trout in Garrett and Allegany counties.

Western Region I staff assisted Bear Creek Hatchery staff to accurately measure flow in each of their raceways in order to appropriately dose medication to control disease issues.

Freshwater Fisheries - Outreach

Provided customer service information for inquiries regarding:

Central Region staff presented information on coldwater trout resources in Maryland to a Forestry Service regional staff meeting. Forestry staff were encouraged to target riparian plantings in trout watersheds across the state.

Western Region I staff provided customer service information for multiple inquiries regarding:

- Trout stocking in Maryland
- Reporting walleye tags for fish caught on Deep Creek Lake
- Pond stocking information
- Fishing license information
- Appropriate personnel for nuisance wildlife complaints
- Permit requirements and approved suppliers to stock a private pond

Tuckahoe State Park Events – Held two events at Tuckahoe State Park on June 3, a license free fishing day. The morning event was a “Learn to Fish” day for the Ridgely Scouts. The Scouts and their parents were provided with a fishing lesson on Fish ID, habitat, knot tying, and casting prior to fishing. Most kids caught a fish during the event. The afternoon event was a “Go Fish” hosted by Tuckahoe State Park, the bite was a little slower, however most people caught something including a very nice largemouth bass.



Ridgely Boy Scouts have fun learning to cast and catching fish.



Fish caught at the Tuckahoe “Go Fish” Fish Rodeo

Rocky Gap State Park– Provided the Mobile Fish Catch Fishing Trailer for a two-day event at Rocky Gap. The first day was a license free fishing day and had many people sign out loaner equipment. Sunday was not a free day, but youth were able to borrow the equipment. The temperatures were a bit hotter than normal, so the fishing was slow both days, with just a few sunfish caught.

Ranger Training - Presented a four-hour interpretive training to Maryland State Park Rangers on how to run fishing programs in their parks. The Mobile First Catch Fish Trailer was on hand to give the rangers a look at what is available to use to host fishing programs. The 10 rangers at the training represented both the western and central parks in the state.



Maryland Park Ranger and staff at Fishing 101 Training

Freshwater Fisheries - Angler Access

Southern Region Manager discussed developing a youth only fishing area within the Merkle Wildlife Sanctuary. Merkle has several ponds that are currently open to the public but none are dedicated specifically for youth or handicapped visitors.

Western Region I staff continue routine checks and maintenance at the McCoole, Black Oak and Evitts Creek FMAs. Staff recently conducted road maintenance at the McCoole and Black Oak FMAs.

West Region I staff placed regulation signs in special management areas throughout Garrett County to help inform anglers of fishing regulations for specific management areas.

West 1 Region Manager and staff attended a site visit at the McCoole and Black Oak boat launches on the North Branch Potomac River. Both sites are to receive upgrades to access roads with resurfacing of the access roads and parking areas.

Freshwater Fisheries - Invasive Species

Staff collected tissues for bio contamination testing from 21 northern snakeheads caught from Little Seneca Lake and three, from Lower Susquehanna River.

Staff began a risk assessment for non-native freshwater drum, which has been found in the upper Chesapeake Bay, and likely traveled through the Chesapeake & Delaware Canal from the Delaware River, where a population has become established.

Central Region staff completed the invasive species removal project at Conowingo Dam. 825 northern snakeheads and 504 flathead catfish were removed from the fish lifts and donated to local food banks.

Freshwater Fisheries - Coldwater Program

Coldwater Monthly Report – June 2023

Coldwater Fisheries Program

Qualitative surveys were conducted in over 15 streams with little historical data to determine coldwater resource occupancy. No new salmonid populations were documented, but several streams were identified as candidates for brook trout reintroduction efforts. Temperature data collected during the summer index period will determine suitability for reintroduction. Qualitative surveys were also conducted in the mainstem of the Savage River from the Savage River Reservoir to Avilton Lonaconing Road. The surveys provided occupancy data for brook trout and brown trout throughout the targeted segment of the river.



Qualitative Surveys in the Upper Savage River

Attended the Eastern Brook Trout Joint Venture (EBTJV) steering committee meeting and participated on EBTJV's website redesign team. Meeting topics included planning for upcoming projects, new funding sources to continue EBTJV's mission, and updates to EBTJV's website to improve outreach and communication.

Participated in the Spring 2023 Chesapeake Bay Program Brook Trout Work Group Meeting. A range of topics were discussed at the meeting. Updates were provided for Goal Implementation Team funded projects, the Rising Temperatures Workshop, and an eDNA project. Attendees also discussed the current work plan and an upcoming review of the plan. Finally, a discussion about the end of the current Chesapeake Bay Watershed

Agreement in 2025 explored metrics for determining success and goals and strategies that should be included in a future agreement. Staff will continue to participate in these discussions to represent Maryland and optimize outcomes for brook trout and coldwater habitat.

Freshwater Fisheries - Tidal Bass Program

Staff participated with Paralyzed Veterans of America bass tournament held at Smallwood State Park by trailering boats, providing aerators for live wells that contained largemouth bass, provided and staffed large tanks to recuperate bass during the tournament, and released bass after the tournament.

Staff worked with a crew from Maryland Public Television for a segment they are creating to showcase bass management efforts and bass fishing on the Potomac River out of Smallwood State Park. The film crew also came back a couple weeks later to catch some video of the department stocking largemouth bass fingerlings in Piscataway Creek. These fish were propagated at the Joseph Manning Hatchery in Charles County.

Freshwater Fisheries - Other

Southern Region staff planted cedar trees at Hughesville Pond to reduce highway noise and to improve the aesthetics of the area surrounding the pond.

Southern Region met with GIS experts to update the current GIFS map extractor with a complete overhaul to improve functionality.