

Cazenovia Lake Percid Survey (Survey #:721028)
James Everard, Region 7 Fisheries

02/09/2022

Cazenovia Lake is a 1,165-acre mesotrophic lake located in the Town of Cazenovia, Madison County. The lake was stocked periodically by the New York State Department of Environmental Conservation (DEC) with walleye from 1961 to 1978; stocking was discontinued because of lack of public access. However, from 1978-1989 some walleye were stocked by the Nelson Sportsman's Club. Access has improved in recent years with the creation of McNitt State Park where carry-in watercraft and ice fishing access are available. In addition, car-top and ice access is available at the Department of Transportation (DOT) parking area off Route 20, and there is public access by permit for trailered watercraft from the Village owned Lakeside Park boat launch. Because of improved access, along with support from local sporting groups, an experimental, five-year DEC walleye stocking program was started in June 2015 (Table 1).

To evaluate the program, October night electrofishing was conducted for five years along the shoreline to determine the relative success of the 50-day walleye fingerling stocking. No young-of-year (YOY) walleye were captured during these surveys. The only walleye caught was a 23.5 inch adult in 2015.

A gill net survey was conducted on October 21 and 22, 2021 to help gather more information on the success of the walleye stocking. Three standard 150 foot inland gill nets were set on October 21 and four nets were set on October 22 for a total of seven net-nights. Nets were fished for an average of 20.4 hours (SE=1). A total of 72 fish were caught representing 11 species. Yellow perch were the most abundant species collected (n=24), and seven walleye were caught (Table 2). Overall, the catch was very low compared to the 2012 gill-netting survey where 499 fish were collected, including 50 walleye (Everard 2013). It should be noted that the 2012 survey took place in July and eight net-nights were used. Forney et al. (1994) recommends choosing the same month for both pre-and post-stocking walleye gill-net surveys as catch rates may vary with season. However, October was chosen for 2021 as there would be less recreational traffic on the lake at that time, and walleye were the main target, where in 2012 the target was all species. Of note, a gill-netting survey conducted on nearby Tuscarora Lake on October 5, also produced very low catches, with zero smallmouth bass, which are abundant in Tuscarora Lake being captured (Everard in press). So, the time of year likely contributed to the low 2021 catch rates relative to 2012. The catch per unit effort (CPUE) for walleye in 2021 was 1/net-night (SE=1). The seven walleye collected ranged from 13.9 to 27.4 inches, with an average length of 21.6 in (SE=42, Figure 1). The average walleye relative weight (Wr) was 94 (SE=2). Otoliths (ear bones) were used for aging the walleye and just three age classes were collected, one age-1 and age-3, and five age-10. Only the age-1 and age-3 walleye could potentially be from the DEC stocking as any walleye age 7 or older would either be wild or illegally stocked.

Cazenovia Lake is part of the statewide Big Panfish Initiative (BPI), so it was also surveyed in May 2021 with Oneida trap-nets (see technical brief for survey 721005). Though only one walleye was caught, it was 30 inches and would be considered a "trophy" (≥ 30 in). It was scale aged at 10-years but is most likely much older when considering the otolith ages from



Cazenovia Lake Percid Survey (Survey #:721028)
James Everard, Region 7 Fisheries

02/09/2022

the gill netting survey. Scales are generally reliable for determining walleye ages up to age-7 (Forney et al. 1994).

Based on the low gill-net and fall electrofishing catch rates of walleye in these recent surveys, it does not look like the current walleye stocking has been overly successful on Cazenovia Lake. However, looking at the number of walleye collected in the 2012 survey along with the trophy walleye caught in the trap net in 2021, plus occasional reports of smaller walleye being caught, the lake does have the potential to be a walleye fishery and to produce trophy sized walleye.

The recommendation at this time would be to make Cazenovia Lake a low priority water to be stocked every other year as a maintenance stocking with 50-day or pond fingerling walleye.

Table 1. Recent walleye stockings into Cazenovia Lake by the DEC.

Date	Number	Size
6/22/2015	23,280	1.5
6/23/2017	23,280	1.5
6/25/2018	23,280	1.5
6/19/2019	30,000	1.5
6/25/2020	23,280	1.5

Table 2. Species caught and catch-per-unit-effort (fish/net-night) during October 2021 gill-netting survey on Cazenovia Lake, Madison County. Standard error is in parathesis.

Species	n	Fish/Net-night
Chain Pickerel	1	0.14 (0)
White Sucker	2	0.29 (0)
Brown Bullhead	1	0.14 (0)
Rock Bass	1	0.14 (0)
Pumpkinseed	3	0.43 (0)
Bluegill	15	2.1 (1)
Lepomis Sp.	1	0.14 (0)
Smallmouth Bass	5	0.71 (0)
Largemouth Bass	11	1.6 (1)
Black Crappie	1	0.14 (0)
Yellow Perch	24	3.4 (2)
Walleye	7	1.0 (1)
Total	72	



Cazenovia Lake Percid Survey (Survey #:721028)
James Everard, Region 7 Fisheries

02/09/2022

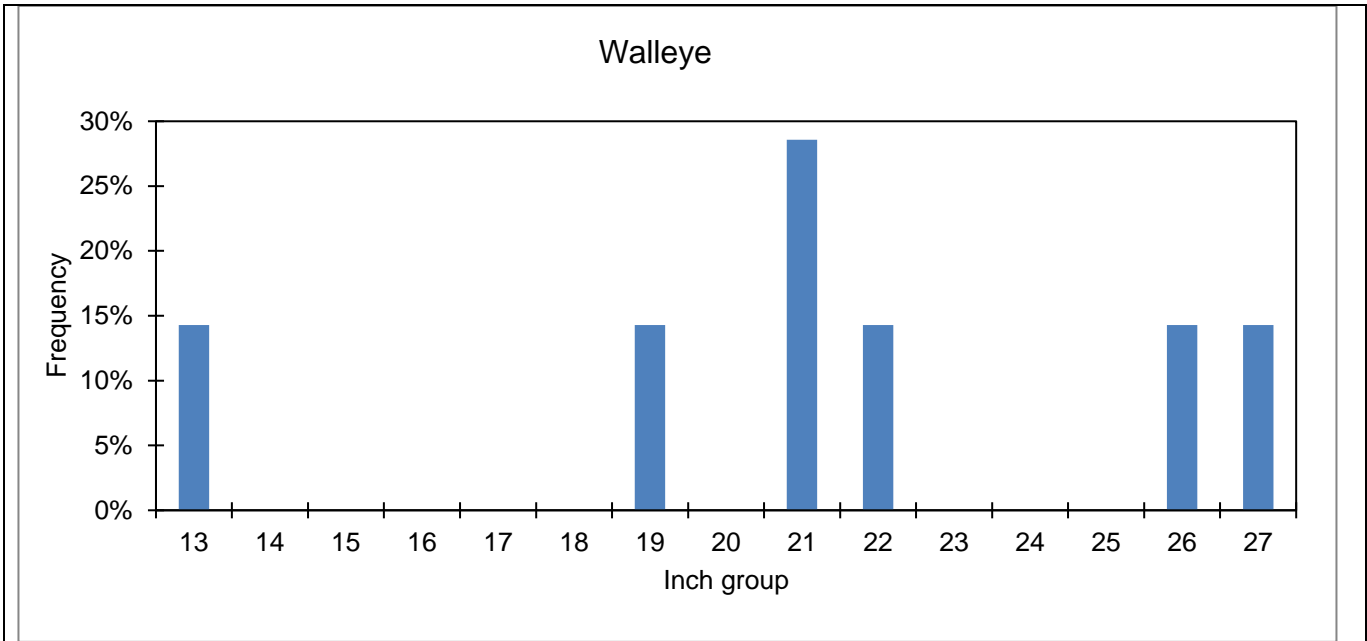


Figure 1. Length frequency distribution of walleye caught on Cazenovia Lake, Madison County during an October 2021 gill-netting.

Literature Cited

Everard, J. F. 2013. Cazenovia Lake Fisheries Survey 2012. New York State Department of Environmental Conservation, Cortland, NY.

Forney, J.L., L.G. Rudstam, D.M. Green, and D.L. Stang. 1994. Percid sampling manual. New York State Department of Environmental Conservation, Albany, NY.

