



## IDNR Fisheries Lake Status Summary Lake Jacksonville

**Location:** 3 miles south of Jacksonville. 30 miles west of Springfield just off I-72.

**Area:** 476 acres

**Lake history and characteristics:** The Division of Fisheries entered into a formal Cooperative Management Agreement with the City of Jacksonville in 1984 to manage the sport fishery. Due to the poor condition of the fishery, the lake was completely drained, rehabilitated, and restocked in 1986. This project produced one of the best Largemouth Bass fisheries in the State. Lake Jacksonville has a maximum depth of 31 feet, an average depth of 12.5 feet, 18.5 miles of shoreline, maintains abundant aquatic vegetation beds, and has a nice double ramp on the north shore. Below is a list of the fish species that are doing well in Lake Jacksonville.

**Largemouth Bass:** The Largemouth Bass population at Lake Jacksonville remains very good. In 2021, the Largemouth Bass structural indices all met or exceeded the lake management goals. Largemouth Bass were collected at a rate of 80.5 fish per 1 hour of electrofishing in 2021, yielding the highest catch rate since 2018 (CPUE=100). Fish ranged from 3.1-21.4" and weighed up to 6.85lbs. 48% of the catchable sized fish exceeded 12", 22.4% reached 15" or better, and 8.8% measured 18" or greater. 4% of the catchable sized Largemouth Bass measured 20" or greater. 15 Largemouth Bass weighed 3lbs or more, and 4 of those fish weighed over 5lbs. Mean average body condition increased from 2020 (Wr=90) to 2021 (Wr=92).

The 2020 fall electrofishing survey resulted in a higher catch rate of Largemouth Bass (CPUE=55.5) compared to 2019 (CPUE=47). In 2020, we collected Largemouth Bass ranging from 4.3-19.8" and weighing up to 5.57lbs. 25% of the catchable Largemouth Bass population exceeded 15" in length, and 18.5% exceeded 18" in 2020. These values were both higher in 2020 compared to 2019 where 10.5% of the population measured 15" or greater, and only 2.6% measured 18" or more.

Lake Jacksonville is currently under a consumption advisory for Largemouth Bass measuring over 15". No more than 1 meal/week is recommended for women beyond childbearing age and men more than 15 years old, while no more than 1 meal/month is recommended for pregnant or nursing women or women of childbearing age and children less than 15 years old. Check [www.IFISHILLINOIS.org](http://www.IFISHILLINOIS.org) for updated consumption advisories. Anglers can catch largemouth bass on points, deadfalls, stickups, and along aquatic vegetation beds in the spring and fall with plastic worms, jigs, spinners, crank baits, minnows, crayfish, and worms.

**Black and White Crappie:** The White Crappie is the dominant crappie species in Lake Jacksonville, however more Black Crappie were collected than White Crappie in the 2021 electrofishing survey. The crappie fishery appears to be improving. White Crappie were collected at a rate of 14 fish per hour of electrofishing in 2021. Fish ranged from 4.4-13.1" and weighed up to 1.1lbs. 33.3% of the catchable population exceeded 10" and 11.1% exceeded 12". Most structural indices met or exceeded the management goal. Average relative weight (Wr=85) did fall below the minimum management goal of 90.

The 2021 spring trap netting yielded 51 White Crappie and 28 Black Crappie in 14 net nights of effort. The catch rate was substantially lower in 2021 but could be attributed to a cold front that came through on the day the nets were set. 100.0% of the catchable White Crappie population exceeded 8", 78.4% exceeded 10" and 19.6% were 12" or greater. 60.7% of the Black Crappie population exceeded 8", 25.0% were 10" or greater.

The crappie regulation changed in 2017, to a 25 fish/day harvest limit with no more than 10 fish measuring greater than or equal to 10". This regulation was put into place with a goal to reduce the density of fish measuring less than 10", which will allow for more food sources and faster growth rates of the remaining crappie and bass. Anglers can catch crappie on stickups and submerged structures in the spring and fall using spinners, jigs, and minnows. The largest White Crappie ever collected during an electrofishing survey measured over 15" and weighed 1.8 lbs.

**Channel Catfish:** The Channel Catfish population continues to remain excellent. The lake is large and turbid enough to potentially promote natural reproduction and it receives approximately 7,000 non-vulnerable Channel Catfish from the hatchery system biennially. In 2021, 6 Channel Catfish were collected per hour of electrofishing. Fish ranged from 9.9-21.7" and weighed up to 3.9lbs. Trap netting resulted in 28 Channel Catfish collected, ranging from 9.3-28.1" and weighing up to 10lbs. Average body condition from Channel Catfish collected via electrofishing was excellent (Wr=95)

In 2020, we collected 3 Channel Catfish/hr. electrofishing ranging from 12.8-19.2" in excellent body condition (Wr = 99).

**Hybrid Striped Bass:** One Hybrid Striped Bass was collected via electrofishing in 2021 and it measured 7.5". Hybrid Striped Bass had not previously been collected in electrofishing surveys since 2016. One Hybrid Striped Bass was collected in the 2021 trap netting survey. It measured 11.8". Angler accounts suggest that the population is doing well and is providing good fishing opportunities. Hybrid Striped Bass are stocked annually into Lake Jacksonville, as hatchery production allows.

Largemouth Bass	2007	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	Management Objectives
% >12"	64	70.6	70.3	57.5	51.2	43.9	43	33	54.7	38.2	43.0	48.0	40-60
% >15"	38	42	52	31.3	26.5	25.4	25	19	21.1	10.5	25.0	22.4	10-20
% >18"	8	15.4	18.9	16.8	12.4	13.7	15	9	14.7	2.6	18.5	8.8	5-10
% >20"	4	6.8	4.1	6.7	3.5	4.9	8	2	4.2	0.0	0.0	4.0	1-5
condition	97	94	98	95	95	93	93	91	96	98	90	92	90-110
fish/hr EF	224	122	113	53.2	71.8	61.5	154	55.8	100.0	47.0	55.5	80.5	>60
<b>White Crappie</b>													
% >8"	78.3	93.8	91.2	92.9	70	78.1	91	100	92.1	92.6	88.0	85.2	30-50
% >10"	34.8	37.5	12.2	35.7	25	11	22	37	18.4	55.6	42.8	33.3	20-40
% >12"	0	6.2	0	10.7	6.7	1.4	3	2	2.6	14.8	9.5	11.1	5-10
condition	89	86	90	89	91	89	86	89	84	91	92.7	85	90-100
fish/hr EF	23	24	128	7	22	32.8	30	24.8	19.0	14.0	21.0	14.0	70-100
<b>Channel Catfish</b>													
% >16"	100	75.9	69.6	66.7	63.6	72.2	62	40	50.0	100.0	33.3	27.3	40-60
% >18"	66.7	44.8	52.2	44.4	36.4	38.9	54	35	50.0	100.0	16.6	27.3	10-20
% >20"	66.7	27.6	30.4	33.3	27.3	22.2	23	25	0.0	33.3	0.0	9.1	5-10
% >22"	33.3	13.8	17.4	22.2	18.2	11.1	8	15	0.0	33.3	0.0	0.0	1-5
condition	101	97	110		96	96	91	97	95	102	99	95	90-100
fish/hr EF	3	7.2	11.7		2.8	4.4	3	5	1.0	1.5	3.0	6.0	5-15

**Other fish species:** Other species present in this lake include Black Bullhead, Bluegill, Common Carp, Gizzard Shad, Golden Shiner, Green Sunfish, Hybrid Sunfish, Redear Sunfish, White Sucker, Yellow Bass, and Yellow Bullhead.

**Fishing Regulations:** see the Illinois Fishing Information Booklet or [www.IFISHILLINOIS.org](http://www.IFISHILLINOIS.org) for updates.

- Two pole and line fishing only and each pole must not have more than 2 hooks or lures attached while fishing.
- Carp, buffalo, suckers and carpsuckers may be taken by means of pitchfork and gigs (no bow and arrow devices)
- Largemouth Bass – 3 Fish Daily Harvest Limit, 14-18” Protected Slot Limit
- Black, White, and Hybrid Crappie – 25 Fish Daily Harvest Limit with no more than 10 fish greater than or equal to 10”
- Hybrid Striped Bass – 3 Fish Daily Harvest Limit, 17” Minimum Length Limit
- Channel Catfish – 6 Fish Daily Harvest Limit

**Aquatic vegetation and/or chemical treatment:**

- None conducted by IDNR Fisheries.

**Fisheries Management Activities Completed:**

- Stocked 2,290 6.5” Largemouth Bass in Lake from Rearing Pond on 11/8/2021.
- Conducted an electrofishing survey consisting of (4) 30 minute pulsed-DC runs utilizing a standard sampling protocol on 10/7/2021. Water Temperature was 71.0-73.0F. A total of 1,420 fish were collected, representing 13 species and one hybrid group.
- Hatchery stocked 10,500 1.5” Largemouth Bass in Rearing Pond 6/22/2021.
- Hatchery stocked 7,150 1.3” Hybrid Striped Bass on 6/17/2021.
- Conducted a trap netting survey 4/20-21/2021. (14) 3’x6’x1” nets were fished for one night each, yielding 14 net nights of effort. Water Temperature was 56.1F. A total of 159 fish were collected and measured, representing 7 species and one hybrid group.