

## Species Status Assessment

**Class:** Osteichthyes (bony fishes)  
**Family:** Catostomidae (sucker)  
**Scientific Name:** *Catostomus sp.*  
**Common Name:** Sucker variant (late spawning sucker of eastern Adirondacks)

### Species synopsis:

Elk Lake sucker is another type of late-spawning sucker, like Summer Sucker or *Catostomus utawana*, that has a slightly different body shape, genetic characteristics that are different from it and from white sucker and therefore appears to be a distinctive species. I'm proposing to call it "Adirondack sucker" but there is no official name yet. It lives in small headwater lakes and streams of the eastern Adirondack Mountains and is known in only 3 ponds, found in 2 of 18 watersheds in NYS. This sucker has similar spawning characteristics to Summer Sucker and when classified as a species, it will be, along with summer sucker, among the only two endemic fish species in the state, and its range is restricted and poorly defined.

**I. Status**

**a. Current and Legal Protected Status**

i. Federal  none  Candidate:  Yes  No

ii. New York  none

**b. Natural Heritage Program Rank**

i. Global  none

ii. New York  none  Tracked by NYNHP?  Yes  No

**Other Rank:**

**Status Discussion:**

This taxa has a small range in lakes and tributary streams in the Adirondack Mountains of New York. There is insufficient information about its status or historic range to offer other discussion

**II. Abundance and Distribution Trends**

**a. North America**

**i. Abundance**

declining  increasing  stable  unknown

**ii. Distribution:**

declining  increasing  stable  unknown

**Time frame considered:** \_\_\_\_\_

**b. Regional**

**i. Abundance**

\_\_\_ declining \_\_\_ increasing \_\_\_ stable \_\_\_x\_\_\_ unknown

**ii. Distribution:**

\_\_\_ declining \_\_\_ increasing \_\_\_ stable \_\_\_x\_\_\_ unknown

**Regional Unit Considered:** \_\_\_\_\_

**Time Frame Considered:** \_\_\_\_\_

**c. Adjacent States and Provinces**

<b>CONNECTICUT</b>	<b>Not Present</b> ___x_	<b>No data</b> _____
<b>MASSACHUSETTS</b>	<b>Not Present</b> ___x_	<b>No data</b> _____
<b>NEW JERSEY</b>	<b>Not Present</b> ___x_	<b>No data</b> _____
<b>ONTARIO</b>	<b>Not Present</b> ___x_	<b>No data</b> _____
<b>PENNSYLVANIA</b>	<b>Not Present</b> ___x_	<b>No data</b> _____
<b>QUEBEC</b>	<b>Not Present</b> ___x_	<b>No data</b> _____
<b>VERMONT</b>	<b>Not Present</b> ___x_	<b>No data</b> _____

**d. NEW YORK**

No data \_\_\_\_\_

**i. Abundance**

\_\_\_ declining \_\_\_ increasing \_\_\_ stable \_\_\_x\_\_\_ unknown

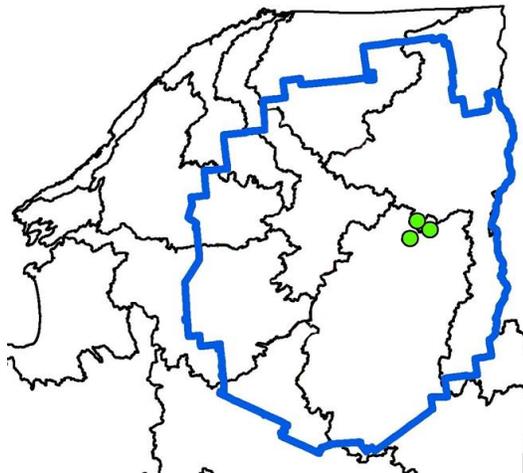
**ii. Distribution:**

\_\_\_ declining \_\_\_ increasing \_\_\_ stable \_\_\_x\_\_\_ unknown

**Monitoring in New York.**

Monitoring programs were carried out by Cornell University in the 1970s (Webster 1973a, 1973b) in Elk Lake, and they have also been completed here and elsewhere by the NYSDEC Rare Fish Unit, NYS Museum and by Josephson (2010), in 2010-2013.

**Trends Discussion:**



Adirondack region of NY showing ponds inhabited by eastern summer sucker, Elk Lake, Ausable Ponds and Boreas Ponds.

Map source: modified from Carlson and Morse 2012

**III. New York Rarity, if known:**

<b>Historic</b>	<b><u># of Animals</u></b>	<b><u># of Locations</u></b>	<b><u>% of State</u></b>
prior to 1970	_____	_____	_____
prior to 1980	<u>150,000</u>	<u>1</u>	_____
prior to 1990	_____	_____	_____

**Details of historic occurrence:**

Abundance in Elk Lake estimated in 1972 & 73, as reported in Webster (1973a), and there are probably similar numbers in the other two lakes

<b><u>Current State</u></b>	<b><u># of Animals</u></b>	<b><u># of Locations</u></b>	<b><u>% of State</u></b>
_____	_____	<u>1</u>	_____

**Details of current occurrence:**

Abundance is probably similar to previous in the few lakes with surveys.

**New York's Contribution to Species North American Range:**

<b>% of NA Range in New York</b>	<b>Classification of New York Range</b>
<u>x</u> 100 (endemic)	<u>x</u> Core
___ 76-99	___ Peripheral
___ 51-75	___ Disjunct
___ 26-50	<b>Distance to core population:</b>
___ 1-25	___ endemic ___

**IV. Primary Habitat or Community Type:**

1. Headwater/Creek, Low-Moderate Gradient, Low Buffered, Acidic, Transitional Cool

- 2. Oligotrophic Dimictic Lake
- 3. Small River, Low-Moderate Gradient, Low Buffered

**Habitat or Community Type Trend in New York:**

Declining  Stable  Increasing  Unknown

**Time frame of decline/increase:** \_\_\_\_\_

**Habitat Specialist?**  Yes  No

**Indicator Species?**  Yes  No

**Habitat Discussion:**

Lakes, creeks, and small rivers with rocky pools and runs are preferred habitat and large rivers are avoided. Spawning has been documented in streams of Elk Lake (Webster 1973a). Mather (1886) describes summertime habitat (post spawning) of late spawning suckers as in deeper waters of lakes.

**V. New York Species Demographics and Life History**

- Breeder in New York
  - Summer Resident
  - Winter Resident
  - Anadromous
- Non-breeder in New York
  - Summer Resident
  - Winter Resident
  - Catadromous
- Migratory only
- Unknown

## **Species Demographics and Life History Discussion:**

This sucker has an adult life span of typically 3-8 years, as considered similar to the summer sucker (Webster 1973a, Morse 2007). It spawns from late May to late June.

### **VI. Threats:**

Predation and competition by invasive species like largemouth bass, smallmouth bass and yellow perch are likely causes of species loss or decline. Acidification has probably affected a few also. Many of the larger lakes formerly occupied by this species underwent major changes in the fish assemblages decades ago. Only three lakes in more remote areas still sustain this sucker.

**Are there regulatory mechanisms that protect the species or its habitat in New York?**

No       Unknown

Yes

**Describe knowledge of management/conservation actions that are needed for recovery/conservation, or to eliminate, minimize, or compensate for the identified threats:**

## VII. References

- Webster, D. 1973a. Life history, ecology and population dynamics of suckers. Annual job progress report. Federal Aid Project no. F-28-R-8, Job 8-C for NYSDEC for period Apr 1, 1972 to Mar 31, 1973.
- Webster, D 1973b. Distribution of dwarf suckers in the Adirondacks. Annual job progress report. Federal Aid Project no. F-28-R-8, Job 8-A for NYSDEC for period Apr 1, 1972 to Mar 31, 1973.
- Carlson, D.M. and L. Demong. 2011 (unpublished). Fish surveys and studies of early and late spawning suckers in Elk Lake, 1972-2010, (H-391-47-P460). Unpublished report, NYSDEC, Watertown, NY 6pp
- Carlson, D. and R. Morse. 2012 (Abstract of poster). Suckers of Elk Lake and the dilemma of the cryptic Summer Sucker. NENH Conference, April 15-19, 2012. On Center, Syracuse, NY.
- Josephson, D. 2010. Ausable Lakes survey and report, spring 2010. Homewaters Fishery Consulting, Old Forge, NY 10pp
- Mather, F. 1886. Memoranda relating to Adirondack fishes with descriptions of new species from researches made in 1882. State of New York Adirondack Survey from appendix to the 12th report (Zoology) 1886:1-56.
- Morse, R.S. 2007. The rediscovery of a species: The redescription, biogeography, and ecology of the summer sucker, *Catostomus utawana*. PhD dissertation. SUNY ESF, Syracuse NY. 103 pp.
- Morse, R.S. and R.A. Daniels. 2009 . A Redescription of *Catostomus utawana* Mather (Cypriniformes: Catostomidae). Copeia 2009 ( 2):214-220.
- Smith, CL. 1985. The inland fishes of New York State. New York State Dept. of Environmental Conservation. Albany, NY. 522 pp.

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