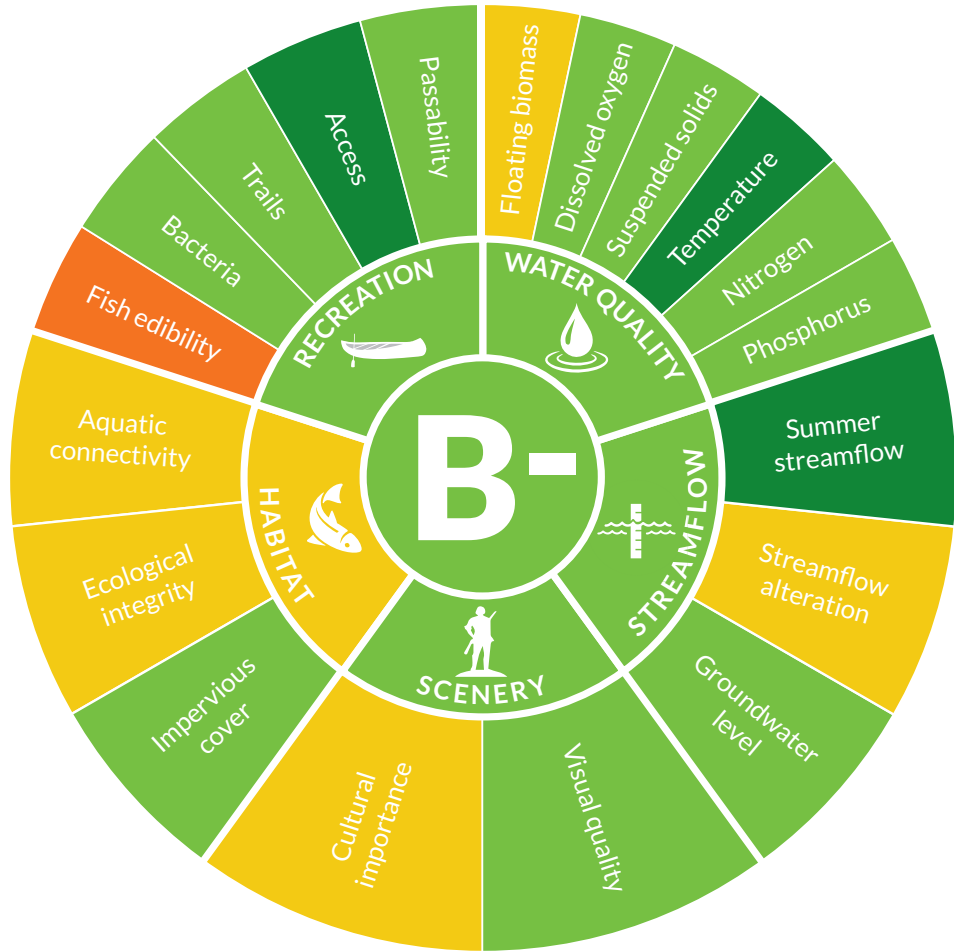
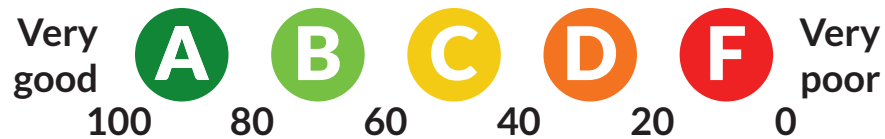


# Overall grade and indicators of river health



## Our health Scale



Details and data at [SuAsCo.ecoreportcard.org](http://SuAsCo.ecoreportcard.org)

# Get involved! You can help protect the Sudbury, Assabet, and Concord rivers



### Become a citizen scientist or advocate

Join us in collecting that data decision-makers use to improve the rivers' health. You can be a voice for the rivers and share your priorities with your community's decision-makers or state policymakers. Sign up for Action Alerts at [office@oars3rivers.org](mailto:office@oars3rivers.org).

### Discover your rivers

We protect what we love. The views and sounds from the river transport us to a different world, away from the noise and rush of our daily lives. Get out and go recharge your soul! Find river maps at [oars3river.org](http://oars3river.org).

### Roll up your sleeves

To keep our rivers open for recreation, healthy for wildlife, and with beautiful scenery, we manage invasive water chestnut and do annual river cleanups. Learn how to become a river steward. OARS needs many other talents, too. Volunteer at [office@oars3rivers.org](mailto:office@oars3rivers.org).

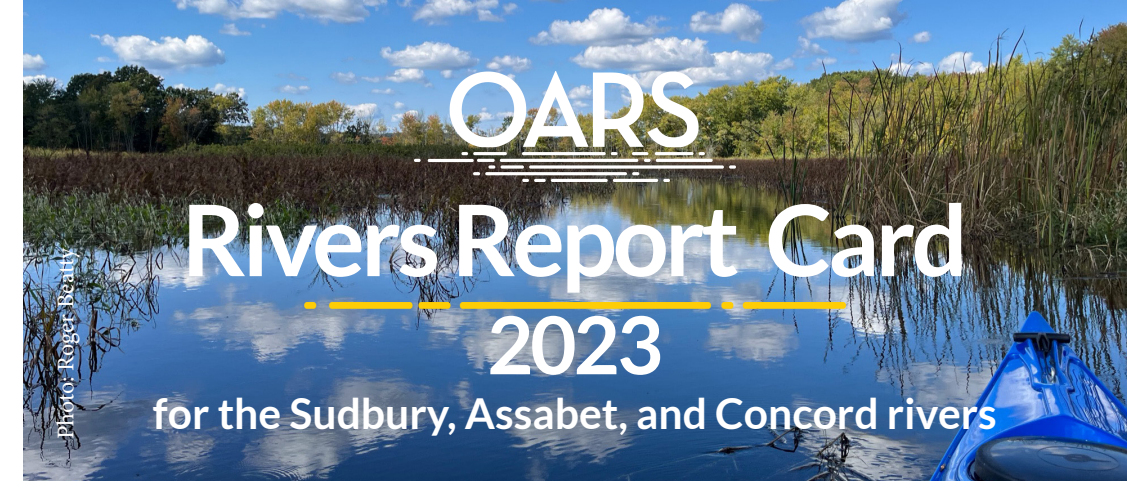
Learn more about OARS at [oars3rivers.org](http://oars3rivers.org)

## About OARS

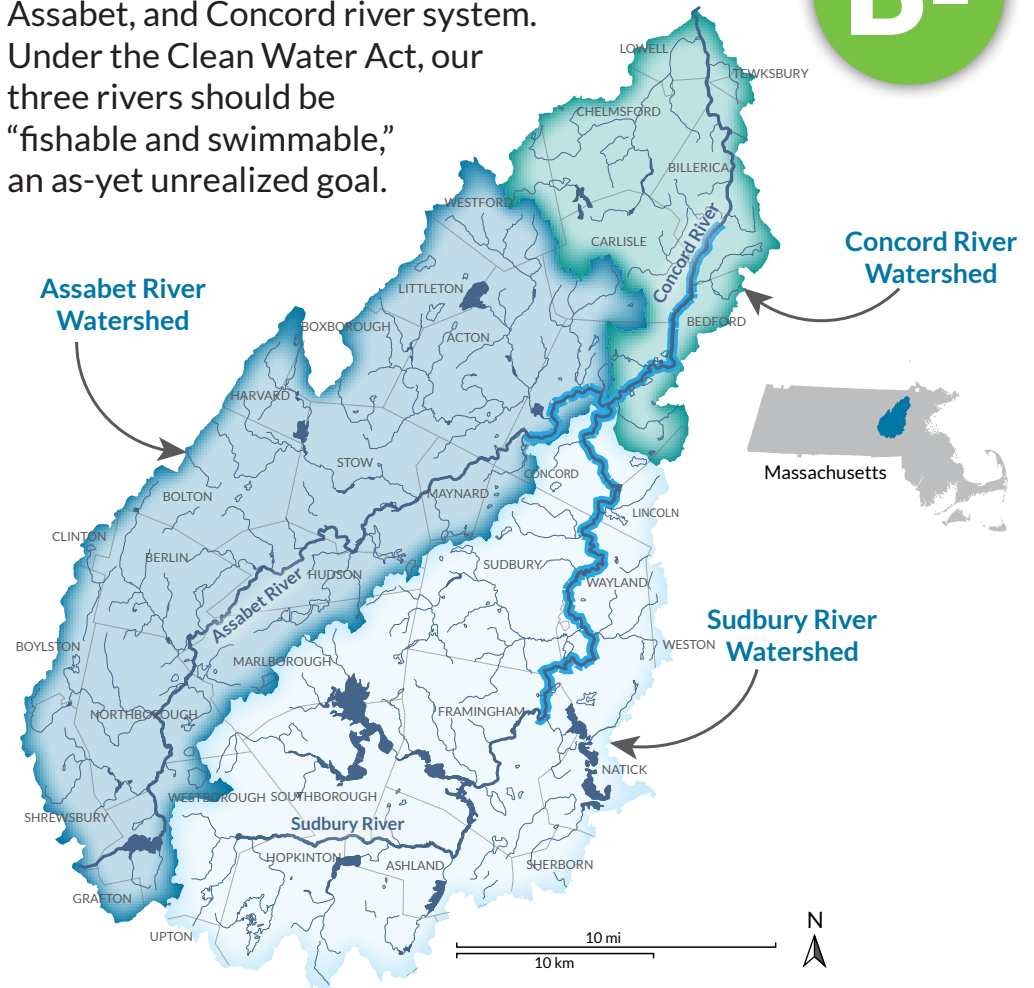
OARS is the non-profit watershed organization for the Sudbury, Assabet, Concord watershed, just 20 miles west of Boston. Founded in 1986, OARS' mission is to protect, improve, and preserve the Sudbury, Assabet, and Concord rivers and watershed for all people and wildlife. OARS' vision is a watershed with resilient streams and rivers that provide healthy wildlife habitat, water supplies, beauty, education, and recreational opportunities for all. OARS is the voice of the rivers, and is an effective, innovative, and inclusive science-based non-profit organization in Concord, Massachusetts.

## Acknowledgements

This Report Card was developed by OARS in partnership with the University of Maryland Center for Environmental Science and with the support of the Massachusetts Environmental Trust, The Sudbury Foundation, The Fleetwing Charitable Foundation Trust, the Sudbury, Assabet, & Concord Wild & Scenic River Stewardship Council, in-kind contributions from the National Park Service and US Fish & Wildlife Service, and the participation of many stakeholders and volunteers.



This scientifically rigorous rivers report card informs you of the health of the Sudbury, Assabet, and Concord river system. Under the Clean Water Act, our three rivers should be "fishable and swimmable," an as-yet unrealized goal.



**B**

### Lower Assabet River

The overall grade is unchanged. The section's extensive trail networks and new access points raised the trails and access scores to A+. The alternating drought and flood years lowered the phosphorus grade; nutrients from wastewater still have an impact. Floating biomass and groundwater level improved somewhat but were worse during the droughts. The many old mill dams obstruct the movement of fish and boaters.

**B-**

### Upper Assabet River

Improvements in recreation trails and river access raised the grade. However, old mill dams still obstruct the movement of fish and boaters. Wastewater treatment plant discharges continued high nitrogen levels, but phosphorus pollution was reduced. Groundwater level improved, reflecting some years with heavy precipitation. Floating biomass increased in one impoundment and reduced in another and was worse in drought years.

**C+**

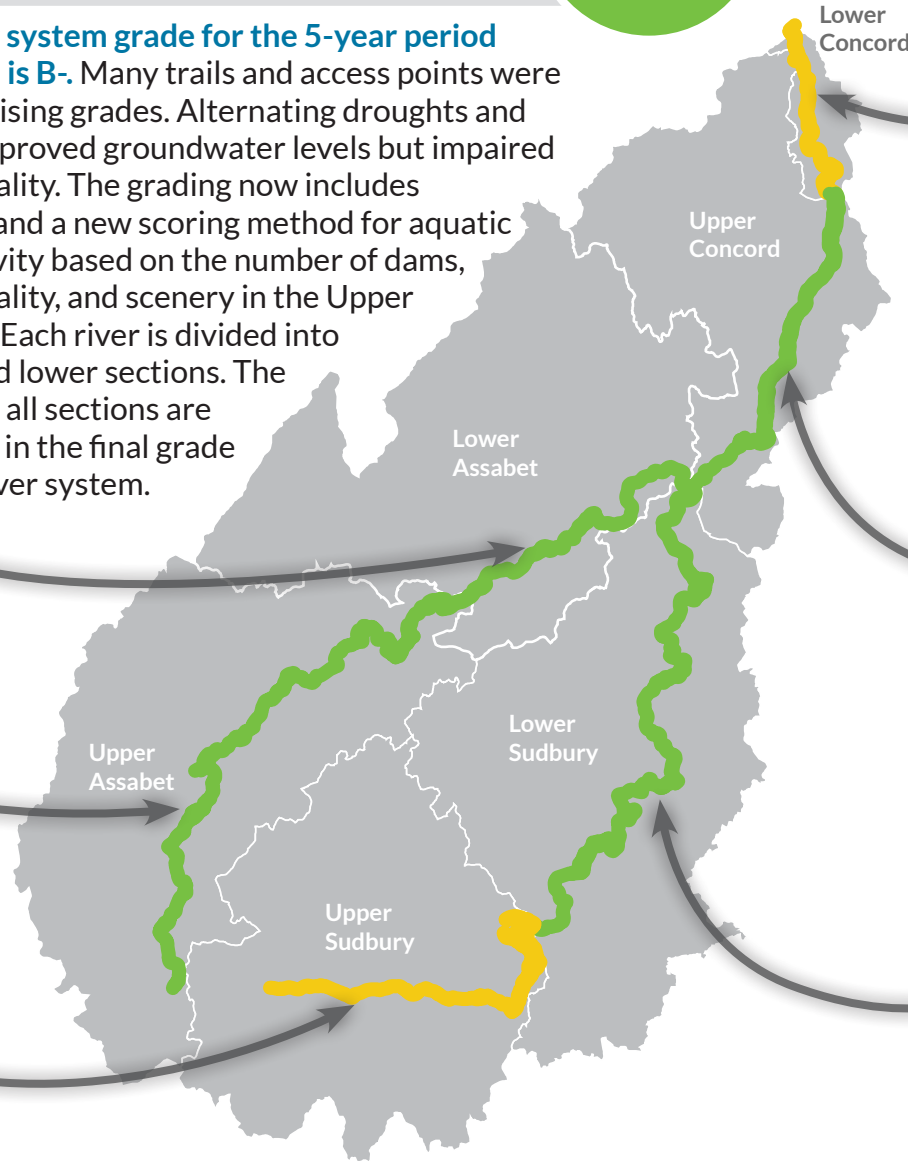
### Upper Sudbury River

The grade improved with new recreation trails added and good water quality despite some bacteria pollution. Fish cannot be eaten due to sediment contaminated by mercury from the Nyanza Superfund site. Old mills and water supply dams obstruct the movement of fish and boaters. Water control at water supply dams alters the natural stream flow. Streamflow and groundwater improved during the years with heavy precipitation.

## The Sudbury, Assabet, and Concord Rivers Report card

**B-**

The river system grade for the 5-year period 2019-23 is B-. Many trails and access points were added, raising grades. Alternating droughts and floods improved groundwater levels but impaired water quality. The grading now includes bacteria and a new scoring method for aquatic connectivity based on the number of dams, water quality, and scenery in the Upper Sudbury. Each river is divided into upper and lower sections. The grades of all sections are reflected in the final grade for the river system.



### Lower Concord River

**C+**

The overall grade is unchanged. Upstream dams, flow manipulation, and urban land use impact this section. However, recent investment in riverfront trails upgraded the trails indicator from D+ to B+. The section boundary was corrected, downgrading the passability grade due to an additional dam. Water quality remains good, and fish edibility remains at a C, the state-wide advisory level.

**B**

### Upper Concord River

This section achieved the highest grade for recreation due to new access points and trails, no dams blocking fish or boating, and is the section most suitable for swimming. It also has significant scenery and cultural resources. Fish are not generally edible due to lingering mercury contamination from the Superfund site on the Upper Sudbury.

**B**

### Lower Sudbury River

The grade is unchanged. It has the highest scenic quality, minimal wastewater discharge, low bacteria levels, and is very accessible. No dams block fish or boaters. The water quality grade dropped due to increased phosphorus and falling dissolved oxygen. No fish should be eaten due to mercury contamination from upstream. The natural streamflow is altered at water supply dams upstream. This is the longest Wild & Scenic River segment.

## River Values

River health is defined by five values developed with watershed stakeholders: Water Quality, Streamflow, Scenery, Habitat, and Recreation. Indicators for each value are graded using scientifically defined thresholds (see Methods Report online).

**Water Quality****Streamflow****Scenery****Habitat****Recreation**