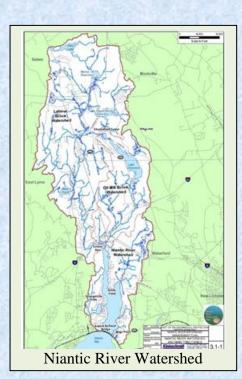


# Niantic River Watershed Committee

# **News from the Watershed**

January 2014



#### Mission:

"To restore and preserve the Niantic River Watershed through intermunicipal cooperation and the sound development of land use practices that mitigate pollution of the watershed, and that support all uses including shellfishing, fishing, swimming, boating, habitat, and drinking water supplies."

The Niantic River Watershed Committee is a volunteer organization dedicated to improving water quality in the Niantic River and its tributaries. The Committee is comprised of volunteers from the four watershed towns of East Lyme, Montville, Salem and Waterford, and nearby communities. We include environmental professionals, municipal land-use board members, shellfish and harbor management commissioners, teachers and professors, and business professionals.

Committee activities are directed by a Board of Directors comprised of representatives from the four watershed towns. Subcommittees, including Water Quality Monitoring and Education & Outreach, engage in activities throughout the watershed.

The goal of the Watershed Committee is to restore and preserve the Niantic River and its tributaries so that they fully support all uses, including shellfishing, fishing, swimming and habitat for aquatic-life.

Activities undertaken by the Watershed Committee to achieve this goal include:

- 1. Improve Water Quality and Biological Monitoring for the Niantic River and its Tributaries
- 2. Support Designated Uses for Shellfishing and Contact Recreation
- 3. Establish a Sustainable Coalition of Partners to Manage the Niantic River Watershed
- 4. Raise Stakeholder Awareness and Involvement by Implementing a Watershed Management Information and Education Campaign
- 5. Support Designated Uses for Aquatic Life
- 6. Protect and Restore Natural Stream Channels

### **Environmental Education**



NRWC provides water quality education for local middle and high schools students via a water quality loan kit. Students collect water samples and conduct simple tests to determine dissolved oxygen, pH, conductivity, nitrogen and phosphorus in local waterbodies.

## **Community Outreach**

Celebrate East Lyme Day!



NRWC attends Celebrate East Lyme Day each year to spread awareness of water quality issues in the Niantic River and inform residents about simple changes they can make in their everyday habits to make a difference in water quality.

## **Water Quality Improvements**

#### **Clark Pond Riparian Buffer Planting:**

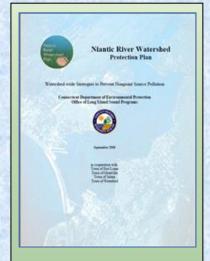


NRWC partnered with Friends of Oswegatchie Hills Nature Preserve and the Town of East Lyme to design and install a riparian buffer along the south shore of Clark Pond, in order to reduce hillside erosion and improve habitat for wildlife.

#### **Niantic River Tree Filters:**



The Eastern Connecticut Conservation District, in partnership with NRWC, the Town of East Lyme and CT DEEP, installed five stormwater tree filters in the Colony Road neighborhood to treat stormwater runoff before it is discharged to Latimer Brook, the main tributary to the Niantic River.



The Niantic River Watershed Protection Plan (2006.)recommends actions to improve water quality in the Niantic River watershed. The Watershed Committee has based its Work Plan, a document that guides the activities of the Committee. on these recommendations.

#### **Board of Directors**

Chris Tomichek Chair Waterford

Marvin Schutt Vice-Chair East Lyme

David Turner Treasurer Montville

Ruth Savalle Secretary Salem

Jeff Crouch Montville-Alternate

Don Danila East Lyme – Alternate

Peter Harris Waterford/East Lyme Shellfish Commission Alternate

> John Jasper *East Lyme*

Rick Kanter Waterford/East Lyme Shellfish Commission

> Marc Lafrance Montville

Doug Lawson Waterford

Don Landers East Lyme Harbor Management/Shellfish Committee

Eric Thomas
CT DEEP

## **Water Quality Monitoring**



Photo by Tim Cook/The Day

**NRWC** conducts water quality monitoring on Latimer Brook once a month year 'round. Volunteers collect data water on dissolved temperature, oxygen, pH and conductivity, and collect water samples to be analyzed for nitrates (a common nutrient).

## **River Bioassessment (RBV)**



In 2013, local volunteers collected aquatic insects from nine stream sites to determine the relative water quality of local streams, based on the tolerance of the insects to water pollution. Results will be published by CT DEEP in spring 2014.

## **Stream Temperature Monitoring**



NRWC placed temperature data loggers in Cranberry Meadow Brook, a pristine cold-water trout stream, a tributary brook flowing from Pigeon Hill, and in Latimer Brook, to document stream water temperatures.

### **Niantic River Watershed Facts**

#### Did You Know?

- The Niantic River Watershed covers 31.3 square miles, or approximately 20,000 acres, and includes areas from the four towns of Salem, East Lyme, Waterford, and Montville.
- Oswegatchie Hills is one of the last large stretches of undeveloped waterfront land in Connecticut.
- The Niantic River does not currently meet state water quality standards because of observed degradation of aquatic life and shellfish harvesting.
- There is a direct relationship between increased impervious (paved) surfaces in a watershed and degradation of water quality.
- Nitrogen and bacteria are the two greatest water quality concerns for the Niantic River.
- Polluted runoff accounts for approximately half (50%) of the nitrogen inputs into the Niantic River.
- Rain carries bacteria into the river where it is filtered by shellfish rendering them unsafe for consumption. The shellfish beds in the River are closed after every rain fall event of at least one inch.
- Excess nitrogen entering the river enriches the brackish Niantic River water, like fertilizer on a lawn, increasing algal and plant growth.
- Beginning in the 1980s, there was a sharp decline in eelgrass and in subsequent years eelgrass populations have shown annual variation.
   Scallops and winter flounder, which rely on eelgrass as nursery habitat, have seen major population fluctuations as a result of degraded water quality.
- New crab and finfish species, which are more tolerant of degraded waters, appear to be on the rise in the river.

#### Contact Us:

Judy Rondeau, Watershed Coordinator 238 West Town Street Norwich, CT 06360 Phone: 860-887-4163 x401 Email: <u>judy.rondeau@comcast.net</u>