

Genoa National Fish Hatchery News and Notes



February 2015



About Genoa NFH

Genoa NFH was established over 80 years ago by the Upper Mississippi River Fish and Wildlife Act. The mission of the hatchery has changed from providing sport fish for area waters to a conservation hatchery concerned with the recovery of endangered aquatic species.

The hatchery is open for tours during business hours. For large groups, please call for an appointment. You can reach the hatchery at 608-689-2605 from 7:30 am to 3:30 pm. You can also find us online at:

fws.gov/midwest/genoa

And on Facebook at:
[facebook.com/GenoaNFH](https://www.facebook.com/GenoaNFH)



Genoa NFH Mussel Biologist Wins Prestigious Science Award

Nathan Eckert, Mussel Propagation Biologist at the Genoa National Fish Hatchery was awarded the 2014 Rachel Carson Award for Scientific Excellence from Service Director Dan Ashe. Considered one of the highest honorary awards in the U.S. Fish and Wildlife Service, the award recognized Nathan for pursuit of applied conservation science methods that has led to extraordinary results in fish and wildlife conservation. Nathan has dedicated his professional career to the conservation of freshwater mussels. The extraordinary results of his work include mussel culture techniques that allow for the mass

production of young mussels. With Nathan's help, Genoa National Fish Hatchery has produced 14.7 million mussels spanning 17 species. He has also successfully grown fawnsfoot and pistolgrip mussels, previously never cultured by the Service. Additionally, Nathan has published a host study for the cylindrical papershell, an Iowa state listed species, which identifies new hosts for future propagation efforts. His expertise is also being used by researchers at the Upper Midwest Environmental Science Center who are looking for ways to kill invasive zebra mussels and Asian carp without harming native mussel populations.

"The fact that I've been selected for an award named after Rachel Carson, a pioneer in this field, is very humbling," said Eckert in response to receiving the award. "If anything, I feel like this recognition means that now I need to do exceptional work and prove that the accolades were deserved."

A champion for mussel research and recovery, Nathan's work focuses on a commonly overlooked group of animals. Well hidden in rivers and streambeds, mussels are silently falling prey to pollution and invasive animals. More than half of the Midwest Region's 78 mussel species are in danger of extinction. An example of the profound impact an individual can have on conservation efforts, his work has directly resulted in the release of more than 50,000 threatened or endangered mussels into waterways in the Upper Mississippi River Basin. Nathan's enthusiasm for mussel research is matched by his commitment to working with partners. He commonly coordinates recovery efforts with federal, state and local partners. Considered an expert in his field when it comes to mussel identification, propagation biology and freshwater mussel life history, he serves as a valuable resource for his colleagues.

The Genoa hatchery congratulates Nathan on his award and looks forward to the future scientific achievements of him and all of our staff! By: Doug Aloisi & Katie Steiger-Meister



Nathan receives the award from Director Dan Ashe and Paul Souza

Spring Approaches...

It is nearing the end of the “quiet” time at Genoa National Fish Hatchery and staff are beginning to scramble to wrap up all the loose ends from last fall and this winter. Once all the ponds are harvested in the fall the clock starts running to get all the annual reporting done, training requirements taken care of, buildings cleaned up, equipment fixed and make any improvements the culture systems or procedures. This winter the staff have been busy re-vamping the sturgeon program, hosting the annual mussel cage production day, experimenting with minnow sorting techniques and testing our oxygen support systems.

It was also time for the bi-annual CPR, First Aid and Automated External Defibrillator (AED) recertification. Genoa National Fish Hatchery was fortunate enough to have a trainer from the American Red Cross come out to the station to conduct the training session on February 27, 2015. The trainer was also able to incorporate the annual Bloodborne Pathogen training as well, rolling everything into one session. The station purchased an AED in 2011 and is fortunate not to have used it to date. Technology advances have now made the AED extremely portable and easy to use, allowing it to be in used in schools, businesses, parks, etc. This wide distribution has increased survival from heart attacks and decreased damage to the brain and heart. Genoa’s AED will begin to diagnose the person’s condition as soon as the pads are attached and will even guide the rescuer through the procedures and CPR cycles. With the moderately remote location of the hatchery, having staff trained in basic First Aid and CPR as well as AED, we should be able to assist someone should the need arise until emergency staff are able to reach the station.

By Angela Baran



Orey shows his parenting instincts while learning CPR

Genoa National Fish Hatchery’s mission is to recover, restore, maintain and enhance fish and aquatic resources on a basin-wide and national level by producing over 35 aquatic species of varying life stages, participating in active conservation efforts with our partners, and becoming a positive force in the community by educating future generations on the benefits of conservation stewardship

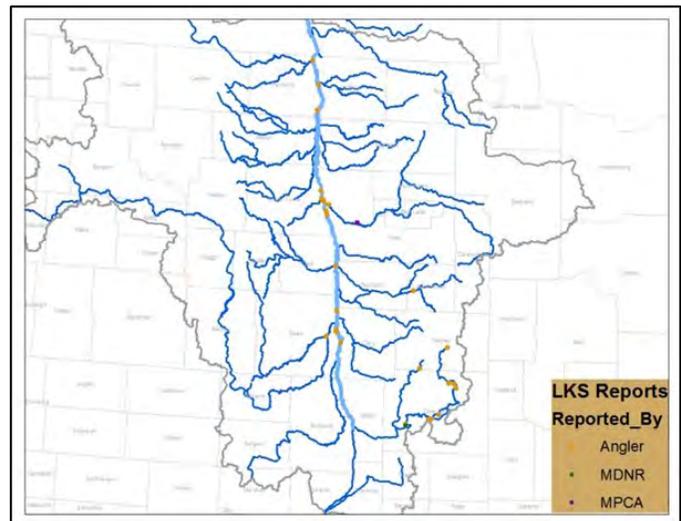


Darla during the Infant CPR training

Anglers and Fisheries Resource Offices Report Lake Sturgeon Catches Stocked by GNFH

With spring around the corner, lake sturgeon begin their migration from larger bodies of water to natal spawning grounds. In the months of April-June hatchery staff will begin collecting sturgeon eggs from natural spawning adults. Eggs will be collected from four river systems (Wolf River, Rainy River, Wisconsin River, and St. Lawrence River) for culture at Genoa. Sturgeon will be reared at Genoa for approximately four months before they are released in support of lake sturgeon restoration for federal, state, and tribal partners. Prior to release, lake sturgeon are coded wire tagged for future assessment of survival, growth, and migration patterns. As part of the restoration goal it is essential to monitor the success of stocking efforts. For example, sturgeon stocked for the past 15 years from Genoa and released within the Red River Basin have been monitored by USFWS, MNDNR, and tribal partners. Fisheries reports by Minnesota DNR and anglers has revealed capture locations of lake sturgeon in lakes and streams within the Red River Basin. Fish stocked in 2007 are reported to be between 45-50 inches. Since female lake sturgeon sexual mature between 20-25 years of age and males between 12-15 years they should start reproducing in the near future. Reports of these large fish are encouraging to hear. It's exciting to know that fish stocked from the GNFH are surviving and doing well in the wild.

By: Orey Eckes



Red River Sturgeon catches reported by the MN DNR

Pond Season Kicks Off!

It's that time of year again when the warmer weather means pond season is starting full swing. The staff at Genoa has been hard at it setting screens, thawing ice, and shoveling mud out of kettles. The captive broodstock pond containing adult yellow perch, black crappie, bluegill, smallmouth and largemouth bass are about to be harvested and sorted and stocked into the spring brooding ponds to spawn. Each species gets its own pond to reproduce



Aaron and Jorge Prep a kettle for Spring

in and later in the summer those ponds will be harvested to remove the adults from the fry. Some fry will be transferred to new ponds to continue to grow to meet station production needs, and others will be stocked to meet station requests. Besides production fish for restoration and recreational fishing opportunities some of these fish will serve as host fish for Genoa's mussel program. These fish will stay on station until they are the appropriate size for the larval mussels to utilize. After that harvest the brood fish will all be transferred over a summer pasture pond, where they will live out their summer days feasting on fathead minnows. Much of the summer fish production relies on a species not very highly sought after and often easily forgotten, however the fathead minnow brood makes raising so many game and host fish species possible. They will spawn throughout the summer in our biggest pond and be trapped to ensure our juveniles and brood don't go hungry. By: Aaron Von Eschen

Encouraging results for a new mussel culture strategy at Genoa NFH

Recent changes in how we run the mussel cage culture operation at Genoa NFH has dramatically increased the number of sub-adult mussels that need to be held in the lab over winter. Over the last two winters these sub-adult mussels have been placed in a flow through system that utilizes pond water from the hatchery. This system has been quite effective, yielding 90 – 95 % survival in animals from fall to spring distribution. The drawback to the system is that the animals will not grow in the cold winter temperatures, and the increase in numbers has us needing additional room. This winter we initiated a trial using our mucket buckets, a recirculating downweller system that is normally used for new juveniles, to grow some of our smaller sub-adults to larger sizes and spread out the culture load. Both fatmucket and Higgins' eye were placed in a mucket bucket and both growth and survival were monitored. Seven hundred animals were stocked in the chambers (500 Higgins' eye, 200 fatmucket). The 60 day experiment concluded at the end of February. For this initial trial sub-adult survival was acceptable, but lower than anticipated (Higgins' eye 85.4%, fatmucket 76.0%). Growth of individuals is where results were particularly interesting. Higgins' eye grew 51.1% while fatmucket grew 66.7%. This short term study indicates that below average size sub-adult mussels can be caught up to the larger individuals in their cohort by utilizing this method over winter. Additional trials are planned to determine optimal feed rates and temperatures in an effort to improve survival. By taking advantage of existing technology in new ways the mussel restoration program at Genoa NFH can continue to grow and expand. By: Nathan Eckert



The new growth on these fatmucket shows in yellow

R.O.A.R. (Read Outside and Relax)

As our world continues to move at a faster and faster pace our youth become more and more fixated on instant gratification. They are becoming people that expect a control pad to instantly reward their repeated tapping with jumps, punches and fireballs or expect a return text on their phone as soon as they hit the send button. Our children are losing the ability to be an individual and think for themselves, to enjoy the warm sun on their faces, and simply notice what wonderful things are happening around them. It is for this reason that the Genoa National Fish Hatchery is working to create the R.O.A.R. program. R.O.A.R is an incentive program that urges children to go outside and read. Through this process we hope the children will relax and see what is going on around them and learn about the environment and their community. The plan for this project is for the U.S. Fish and Wildlife Service, Friends of the Upper Mississippi, La Crosse Parks Department, and the La Crosse Public Libraries to come together and provide outdoor reading locations. Between the various offices and parks 8 locations will be designated as R.O.A.R sites and participants must go to these places and read. While there they will be able to receive a mark on a passport or guide book stating that this achievement has been met. Upon completion of reading at all of the sites participants will receive a coupon thanks to a donation through Courtesy Corporation-McDonalds that awards them a free desert at an area restaurant. The Friends of the Upper Mississippi are also getting involved by equipping some of the R.O.A.R. sites with reading benches. Genoa is looking at installing a few of these benches around the Sense of Wonder Wetland walking path to provide a place to read or simply sit and observe the outdoors. As another bonus the friends are also looking at potentially dedicating these benches to past friends members as a way of remembering their contributions to the organization. This project is in conjunction with the U.S. Fish and Wildlife Service's Children in Nature initiative. Genoa plans to incorporate outdoor reading into the outdoor classroom and sturgeon in the classroom programs as we strive to connect children with nature. By: Jorge Buening

Upcoming calendar of events

April 2015

Sun	Mon	Tue	Wed	Thu	Fri	Sat
			1 Jeff @ MOCC Meeting	2 Monarch Butterfly Training	3 Walleye netting Begins	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22 Lincoln Middle Outdoor Classroom	23	24	25
26	27	28	29	30 Badger Camp		