

Ron Jenson's Corner, TIA President



keep telling everyone that it is a good thing I am retired, as I would never have time to work! Fortunately, I think this is the attitude of our whole board of directors. We took the months of January and February off, and now we are "back in the groove", so to say. Spring is one of the busier times of the

year for the refuge staff, and that also creates opportunities for T.I.A. volunteers to help wherever needed. The refuge schedule gets extremely busy with school group visits for field trips, as well as all the day-to-day tasks that must be accomplished.

The schedule of events in the next few months is quite impressive, so be sure to check out

our website where all public events will be listed. One of the non-public events is that the National Wildlife Refuge Association has picked Tamarac National Wildlife Refuge and Detroit Lakes as the host site for their annual board meeting. The refuge staff and T.I.A. are very excited to be part of this important meeting.

We are in the process of updating our gift shop computer system. We have installed Quick Books to handle our point-of-sale, as well as tracking inventory levels. This, of course, means bar coding and all the inherent problems that go with such a project. The end result will make it much easier for our volunteers to handle the day-to-day transactions that occur.

We are always in need of volunteers. So, if you have some free time, give us a call. The rewards are ten-fold. The many tasks the refuge staff is involved in require a lot of hours, so any volunteer help will be greatly appreciated. The salary is great (none), vacation time (none), health benefits (none), self-gratification (immeasurable). The most intangible of all is the benefit of connecting with nature.

About the Cover Design

ur Earth Week 2008 cover was designed by Denis Mudderman. The earth photo is a NASA composite from multiple images. The woodland sunflower, Visitor Center scene, and blue sky with clouds are from separate photos taken by Denis Mudderman at Tamarac NWR.

Join TIA

Individual/Family: \$15 Patron: \$100 Life Member: \$250

Student: \$10

Members receive our quarterly newsletter mailed to your home, a 10% discount on purchases from *Tamarac Wildlife Gifts & Bookstore*, and invitations to special member events. Download a membership form from our website (www.tamaracfriends.org).



Tamarac Interpretive Association, Inc.

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The Tamarac Interpretive Association is a 501(c)3 organization whose mission is to facilitate activities and programs that interpret, protect and restore the natural and cultural resources of the Tamarac National Wildlife Refuge.

Ron Jenson, President	Ogema, MN	Term Expires 2008
Ruth Olson, Vice President	Detroit Lakes, MN	Term Expires 2009
Theresa Haney, Secretary	Rochert, MN	Term Expires 2009
Wayne Olson, Treasurer	Detroit Lakes, MN	Term Expires 2010
Donna Stewart	Rochert, MN	Term Expires 2010
Denis Mudderman	Rochert, MN	Term Expires 2008
Don Blanding	Detroit Lakes, MN	Term Expires 2008
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Bears, Wolves, Trumpeter Swans, Loons & Song Birds Observe them on the Refuge and Find them at Tamarac Wildlife Gifts & Bookstore



By Denis Mudderman

A visit to Tamarac NWR is always a joy in experiencing the tranquility of the forests, prairies and lakes. Each trip is an adventure of wildlife observation. Will your next trip be the one when you finally spot a bear or, even a wolf?

Not only can you enjoy nature at Tamarac NWR; but, with a stop at the Visitor Center, you can browse a jewel of a nature gift shop and bookstore. If you are a TIA member you already know that the Tamarac gift shop is the place to go and spend time (and money).

Wayne Olson, gift shop manager, has been working over the fall and winter to add many new items. The gift shop is overflowing.

I particularly like the new "wolf howling at the moon" graphic with Tamarac's

name at the bottom. Currently, you can buy a white or maroon scarf with this design, and there are a limited number of red vests with this



design on the breast pocket.

Many people loved the trumpeter swan T-shirts that became available last year. Now you can buy that design with a grouse image.

Loons, loons, and loons. Everyone loves loons; and anything that involves loons has been flying off the



shelves—even in an unpackaged state. Wayne has added more varieties of loon figurines. Everyone loves trumpeter swans, too; so Wayne has added several sizes of trumpeter swan figurines.

When you come to Tamarac for your first spring hike, stop by the gift shop to buy yourself a new walking stick.
Wayne discovered a neat, new line of



walking sticks by Ancient Graffiti with basic bird, wildflower, and other ID incorporated into the walking stick as a design. Don't forget to buy a compass. You can buy a combination whistle and compass that has the rustic appearance of an item the TIA board may have spent some of their winter carving.

The Native American craft section has been restocked to include many new items. In the clothing section, there are more great T-shirt and sweatshirt designs, each with a good variety of sizes and colors.

Of course, the book section is the best nature book collection for miles and miles around.

The gift shop is open when the Visitor Center is open. Right now the hours are Monday-Friday from 8am-4pm. Beginning the weekend of May 17-18 and continuing until early October, the Visitor Center will be open Saturday and Sunday from 10am-5pm. Of course, TIA's gift shop accepts Visa and MasterCard.

Tamarac Wildlife Gifts and Bookstore will also have a table with books and products at the Detroit Lakes Festival of Birds May 15-18.

With the outstanding selection of "Tamarac" branded products, Wayne Olson is working to make it possible to accept orders for shipping. In the future we will feature these items in the gift shop section of the TIA website (www.tamaracfriends.org).

TIA Website: Your Source for Everything Tamarac

Our website has a new organization and slightly new design (pictured to the right). We still have basic refuge information and a complete events and activities calendar. Several new sections have been added. Environmental education is an important refuge and TIA effort, and this new section will be an important resource for teachers and students. We've always had an extensive photography section with a long list of photo collections, including all

the photo contest winners. A new section called "Wildlife Cinema" will feature online videos ranging from a few minutes in length to over an hour. We are starting with YouTube and other embedded internet video, but before the summer ends we hope to begin adding our own. Our increased web and graphics capabilities are partially due to funding provided by a National Fish and Wildlife Foundation grant.



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Featured Volunteer: Theresa Haney

heresa Haney started volunteering at Tamarac shortly after she retired in 1989. Before that, she worked as an advocate in the Becker County Court for mentally institutionalized patients. Since retiring Theresa also served on the St. Mary's Hospital Board, established the St. Mary's foundation, and has sat on advisory boards for the Holy Rosary nursing program and the MSCTC nursing program.

Theresa now lives on the western border of the refuge with her husband Jim. She has frequently visited and traveled through Tamarac for most of her life. Her family would come to Tamarac for picnics, hiking, snowshoeing, and crosscountry skiing.

During these Tamarac visits, Theresa

has had many wildlife encounters. One time she saw a moose with her baby come out of the woods near Balsam Lake. Refuge Biologist Lowell Deede didn't believe her until he found the tracks. Theresa also watched as a fox stalked and finally caught a goose amidst a gathering of hundreds. The geese flew off, but returned to the same spot as the fox ate his lunch. Hearing packs of wolves have been commonplace for her.

Theresa feels that people often drive through the refuge with their eyes closed and miss so much of nature's wonders. She once had a different problem with her sister and brother-in-law when they visited from west central Iowa. Her brother-in-law was amazed that the trees hadn't been cut down to plant corn, not



Rosie Greenland and Theresa Haney collect memberships at the TIA table during the Fall Festival.

realizing about Tamarac soils and climate.

Theresa is the current Secretary for the TIA board, and continues to both volunteer and listen to the wolves from her vantage point near the refuge.

Become a Tamarac Volunteer! Register for New Volunteer Orientation on May 28





Miles and Laura show us that you can be any age to make a contribution at Tamarac.

ast summer Laura and Miles volunteered occasionally in the Visitor Center. On August 24th they both worked to stuff suet into a bird feeder, washed windows, and greeted visitors. Discover the fun of volunteering at Tamarac. Contact Janice Bengtson, Volunteer Coordinator for details. Come to the Earth Week volunteer refuge cleanup on April 24, and sign up for the volunteer orientation in May.

Contributing Artist: Laura Boyle



aura Boyle is a 4th grader at Rossman Elementary School in Detroit Lakes. During the summer, she enjoys helping at Tamarac Refuge. Her favorite thing is to assist with duck banding. Although she also helps with the Canada goose banding, the geese are quite large and scare her a little. She also likes woodcock surveying

and helping in the Visitor Center. Laura likes coming to the refuge because there is always so much to see. Invited to provide the newsletter back page art, Laura decided to draw a trumpeter swan because she remembers taking an injured swan (whom we all called Ziggy) to the Animal Rehabilitation Center in Minneapolis. She learned from that trip how important it is to take care of wildlife and their habitats. She was going to write, "Honk, for clean water," but realized that trumpeter swans "trumpet".



Laura showed visitors a salamander at the 2007 Tamarac Fall Festival before releasing it back into the wild.

Spring is Here

By Barbara Boyle, Tamarac NWR Manager

Spring is officially here!!!
Really? Besides the fact that it says it on the calendar – "First Day of Spring" – what truly signifies the change of season? Well, for me,



it's usually that extra burst of energy from the excitement of longer days and brighter sunshine. It's the explosive sounds of robins chattering. With each new day and new spring signal, the anticipation grows.

The changing season means the annual "spring cleaning" here at Tamarac Refuge. It is an exciting time of year for us. We brush off our office cobwebs and step outdoors to enjoy the events of spring. During this season, we will be removing litter from road ditches to improve water quality, performing annual prescribed burning to stimulate plant growth, inspecting culverts for debris blockage to permit water flow, and monitoring the return of waterfowl and other wildlife to assess the health of Tamarac's habitats.

This seasonal period of change is timed perfectly in Minnesota with Earth Day – April 22. Earth Day began in 1970 as a way to demonstrate for a healthy, sustainable environment. It is intended to inspire awareness of, and appreciation for, the Earth's environment. It is a simple message – take care of Earth for the long haul. This message is also in keeping with the mission of the National Wildlife Refuge System – conservation of lands for the benefit of future generations

And it's a message that everyone gets. It is why so many people take the time to clean up outside after the long winter. So remember, community members performing annual spring cleaning, like picking up litter that has accumulated all winter, are also practicing good land stewardship to ensure clean waters, healthy habitats and diverse wildlife.

Testing the Waters

By Wayne Brininger, Tamarac Wildlife Biologist

Since approximately one-third of the National Wildlife Refuge System lands are wetland habitats, an important aspect of environmental health pertains to water quality. A refuge does not exist in isolation from its surrounding watershed. Collecting information in a standardized manner supports a national initiative to address external threats to air and water quality. Tamarac utilizes volunteers to identify conditions and trends of water quality in key shallow lakes on the refuge. Volunteers will also collect water quality data on the Egg, Ottertail and Buffalo Rivers.

Tamarac NWR is situated at or near the top of two major watersheds within Minnesota, both of which eventually flow into the Red River of the North. Most people would think that having a position at the headwaters of a watershed would allow water quality to remain in pristine condition. However, there is currently no data to make comparisons in water quality changes over the years.

In 2007, refuge staff and volunteers participated in MPCA's Citizen Lake and Citizen Stream monitoring programs where basic assessments were made for total phosphorus, ortho-phosphorus, chlorophyll-a and water transparency on three refuge lakes. On seven stream sites basic turbidity, total suspended solids and nitrate-nitrite, total phosphorus and ortho-phosphorus were assessed. Although this effort established the bare-minimum assessment, future efforts will focus on the more detailed parameters at more regular intervals to garner more detailed characterizations for shallow lake and stream ecosystems,

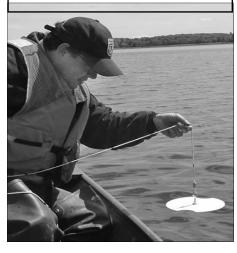
particularly wild rice dominated systems, which are poorly understood in terms of water quality.

Become a Tamarac Volunteer Water Quality Monitor



Participate in a fun and important activity that gets you out on Tamarac NWR lakes and streams.

More volunteers are needed to help with Tamarac water quality monitoring. On the job training is provided. For more information contact Janice Bengtson, Tamarac Volunteer Coordinator, at 218-847-2641 in time for the April 28 training.



Wayne Brininger operates a Secchi disc.

Coming in the Next Issue: Fishing at Tamarac



Your catch of the day?

We want to hear your Tamarac fishing stories, tall tales your grandfather told you about fishing at Tamarac, photos of your catches, creative writing or poems about fishing at Tamarac, and fishing secrets if you want to share any. Contact the newsletter coordinator with your ideas.

Birds in a Changing Climate

By Kelly Blackledge Senior Park Ranger



Birds are responding to climate change in different ways. Some are adjusting the timing of their migration and nesting, while others are expanding their range. Just a few years ago the Northern Cardinal was a rare site around Detroit Lakes, today we see them regularly. At this year's Festival of Birds you will hear from experts of Minnesota's forests and grasslands as they uncover expectations of change and what that means for our bird populations that rely on these habitats. Author and scientist, Scott Weidensaul, will share revelations

of his birding travels across the continent. At his Saturday evening keynote you'll find out what we've gained and lost, and see a glimpse of what the future holds for wildlife and wild lands.

This year the festival feature bird is the Connecticut Warbler. A new fieldtrip to the Red Lake area will strive to see this highly sought after bird. The Connecticut warbler nests in the Red Lake Management area and guides will take you right to the spot it is so often seen and heard. You'll also find that two trips to Agassiz National Wildlife Refuge are included to satisfy that hunger to see a plethora of shorebirds. Last year festival trip leader Doug Buri exclaimed, "I've been looking at shorebirds for 40 years and I don't ever recall seeing 25 species in just 2 hours. What an amazing day!" Last year people on this trip were also graced with a flock of Hudsonian Godwits that numbered just over 90 birds. In just four hours these birdwatchers sighted 135 different species of birds. One other new trip will head to Glendalough State Park. Weidensaul will join this bus tour and share his birding talents particularly with raptors. On Saturday morning, a fantastic trip to Tamarac Refuge will feature upwards of 25 species of woodland warblers. Refuge Manager Barbara Boyle and biologists Wayne Brininger and Lowell Deede will guide you to all the best birding locations.

Highlights this year include a hands-on rain garden workshop that will create a

rain garden near the Detroit Lakes pavilion on the beach. Also new is a digiscoping workshop where participants will learn how to make the most of their optics and camera. Along with the variety of vendors at Saturday's Birders' Bazaar there are two free workshops. One will bring to light the best buy for your buck when it comes to dollars for conservation, the other will help you train your ears to listen for those birds so rarely seen, yet often heard.

The Festival of Birds committee is excited about the 11th annual Festival of Birds coming May 15-18, 2008. If you are interested in helping with registration, being a host at an evening event or workshop, decorating tables for the dinners, have a donation for the silent auction, or not afraid to wake up early and serve at the bird club cafe please contact Kelly Blackledge at Tamarac Refuge (218-847-2641) or Cleone Stewart at the Chamber (218-847-9202). The Tamarac Interpretive Association is selling all books sold at the festival, including several by Scott Weidensaul who will be signing books on Saturday afternoon. Be sure to visit the booth and use your 10% discount for your birdwatching supplies.

The program booklets are now available and registration is online at www.visitdetroitlakes.com. There is limited seating on the fieldtrip busses so don't wait to sign up!



see a red-necked grebe or foresters tern.

You can also just come to the Visitor Center and watch the many birds at the feeders. The Tamarac Wildlife Gifts & Bookstore has an excellent collection of books on birding. You can also buy all you need to set up a bird feeder at your home or lake cabin.

Beginning Birding at Tamarac

S pring is a great time to start a birding hobby, especially with our great location near prairie, woodland, and pineland. Tom Frank of Detroit Lakes, MN suggests, "don't move about quickly. Stop, listen, and look. Start learning to identify birds by their call"

As far as good locations, Kay Hartness of Detroit Lakes says "A good place to watch for warblers in the morning is in the wooded area of the public access to

Cotton Lake. Ducks and other waterfowl can be seen at the north landing of Height of Land Lake. Hanson Lake Road is only a mile or two long but holds many good surprises to those who walk."

Biologist Wayne Brininger recommends walking the dike between North and South Tamarac Lakes. This is a good spot to hear American Bitterns, Least Bitterns, Marsh Wrens and maybe

Global Warming and Tamarac NWR

cientists have documented many ecological consequences of climate change in the United States. Higher winter temperatures and drought has lead to pest outbreaks and forest die-offs in the West. Earlier snow melts and the increase of temperature in streams has contracted the range of cold water fishes such as the wild brook trout. Lower soil moisture has lead to more intense, frequent, and wide spread wildfires. Loss of sea ice or retreating ice threatens polar bear, pacific walrus, and many seal species. Altered life cycles and distribution of wildlife species, like the Baybreasted, Cape May and Tennessee warblers have all had changes in their distribution. Sea level rise has caused an acceleration of shoreline erosion, wetland submergence and salinity increase along low-lying coasts. For example, since the 1930's Blackwater National Wildlife Refuge has seen a loss of 8,000 acres of coastal marsh.

The map (upper right) highlights graphically the expected changes to Minnesota climate over the next century. Winter temperatures are expected to increase 4-8°F and summer temperatures may increase 7-16°F by 2095. Winter precipitation is expected to increase by 15-35% and summer precipitation will decrease by as much as 15%. Whether

The Director of the Fish and Wildlife Service (FWS), H. Dale Hall, has no substantial argument with the conclusions of the Intergovernmental Panel on Climate Change, that it is very likely that emissions of heat-trapping gases from human activities have caused most of the observed increase in globally averaged temperatures since the mid-20th century. Director Hall states that, "The professionals of the Fish and Wildlife Service have faced adversity in our history, from the severe droughts of the 1930s to the environmental effects of chemical pesticides highlighted in Rachel Carson's Silent Spring. The warming of the earth, however, could potentially have more far-reaching impacts on wildlife and wildlife habitat than any challenge that has come before us."

warmer and more rain, or warmer and less rain, a drier climate will be produced from the increased evaporation from the warmer temperatures. As a result, Minnesota soils may be drier and there may be more frequent droughts. The growing season could be 3-6 weeks longer. Declines in the ice cover on the Great Lakes and inland Minnesota lakes are expected to continue.

Some of these consequences will effect Tamarac refuge. In the northern states, it is very likely that there will be an increase in intense heavy precipitation events instead of several light rain events. Reduction in soil moisture changes the composition of plant communities and the wildlife it can support. Our area of the country has also seen a decli

country has also seen a decline in the number of frost days and an increase in growing season days. This has an impact on the success of invasive plants and insects increasing the abundance. Tamarac refuge could very likely see an increase in invasive species such as leafy spurge, purple loosestrife, and buckthorn which threaten native wildlife habitats.

Ecologists have identified that the wildlife of highest risk to climate change are those with limited dispersal abilities and those that are on the edge of their range. Since Tamarac sits on the edge of three major biomes many of its species could be at risk.

One species, recalling Theresa Haney's story about her moose sighting at Tamarac NWR (page 5), is the disappearance of moose from Minnesota due to the stress from warmer temperatures.

For the refuge, the conservation challenges that we face today are much different than when it was established. Each wildlife refuge must incorporate



Following trends, by the end of the century Minnesota's summer weather could resemble that of present day Kansas, and winters could resemble Wisconsin. How would Tamarac habitats and wildlife respond? The map above is modeled after one produced by the Union of Concerned Scientists as reported in "Confronting Climate Change in the Great Lakes Region."

global warming into their long range planning in their Comprehensive Conservation Plans. The Tamarac NWR staff is challenged with managing for resilience in the face of uncertainty.

Global warming issues produce much debate especially given public policy choices. Even if one discounts the more dramatic conclusions of global warming, Earth's climate does change. Fifteen thousand years ago there was a sheet of glacial ice across Minnesota. At other times in Earth's history tropical rain forest conditions existed throughout the globe. European immigrants and their descendents have been in Minnesota only a couple centuries and we now face changes.

Our individual challenge, this Earth Week, is to be good stewards of the Earth, from our care of nature, our use of energy in our home and with our vehicles, and taking the time to recycle.

Kelly Blackledge and Denis Mudderman contributed to this article.

What Could Have Been Or Visit the Tamarac Casino!

By Jim Jasken

We often chafe at regulation, legislation and guidelines. It is a favorite pastime to feel victimized by restrictions. Let us take a look at Tamarac without a history of "rules."

I have walked its miles, tasted its venison and grouse, and met its bears. I have watched its birds, smelled its marshes, and happened across a fresh timber wolf kill. I always came to expect the peace of the wild and was never disappointed. However, were it not for individuals with vision long ago, and those with continued vision today, this land would be much different.

Consider:

1. Twelfth Annual Blackbird Lake Mud Run. ATV course looping the lake and adjoining marsh! The water levels are high - prepare for lots of MUD!



- 2. US FEST Ten of America's Greatest Rock Bands! At Ogemash Activity Center, new 2500 car parking lot!
- 3. NEW Tea Cracker 64-plex Condos! Over-looking the serene Ottertail River! Country living at its best! Hurry for showing!
- 4. Tamarac NWR Casino attached to Visitor Center! Conference rooms, great entertainment, video room for the kids!
- 5. AIR SHOW AT THE REF-UGE! You think eagles can soar? You think hummingbirds are tricky? You ain't seen nothing! We'll rattle the pines and ripple the ponds!

Ludicrous? Probably. Pointless? Maybe not.

Another Refuge Threat: President Proposes Flat Refuge Funding for 2009

By Denis Mudderman

hreats to Tamarac and other refuges also come from inadequate operating budgets. Each year the refuge system needs an increased budget of \$15 million to keep up with rising costs. For a number of years prior to 2007, refuge funding remained at the same level—in effect a budget cut. In our FWS Midwest region, a year ago, a 20% workforce reduction was required, including 27 positions in Minnesota.

Refuge funding is not a partisan issue. Both Republicans and Democrats have signed on to the Refuge Caucus. The party change after the 2006 election led to different dynamics and increased funding was enacted for fiscal year 2007 and 2008. However, the President proposed a 2009 refuge budget of \$431.1 million, basically the same as current 2008 funding. Years of stagnant fund-

ing has amassed a \$3.5 billion Operations and Maintenance backlog, plus the needed yearly increases.

The refuge system needs \$514 million in funding for 2009. Refuge supporting organizations such as the National Wildlife Refuge Association (NWRA) and friends groups have been working to support the \$514 million level of funding. In March, the House Appropriations Interior Subcommittee scheduled a day for friends group testimony. Written testimony was accepted as well. The written testimony that TIA submitted can be read on the TIA website. With Congress and the committee's makeup the same as last year, we can be optimistic. More information on these funding issues can be found on the NWRA website (refugenet.org).

Excerpt from Refuge Manager Narrative Report May - July, 1938

limate conditions in this region is • of considerable importance in the development of the project. It is difficult to make accomplishments in the field as compared with refuges in warmer climates. For example: during the entire month of May there was only four days when the sky was clear and the sun was seen. On the seventh of May there was a heavy snowfall, the ground was covered with six inches of it. Travel to points where work is carried on was extremely difficult; it was necessary to spend much time pulling cars out of mud holes. On one occasion when endeavoring to get to Lost lake one car was mired, a second car was used to pull the first one out, it also went down and finally a tractor had to be used to pull the cars out. With each car stuck it was necessary to walk a distance of nine miles. Incidents like this happened quite often and made it necessary to ride horseback in steady rain to patrol certain distant points of the refuge to find out what wildlife was inhabiting the refuge.



Wayne Olson and Ron Jenson at the U.S. Capital

ayne Olson and Ron Jenson represented TIA at the National Friends Conference in Washington D.C. from April 4 to 7. Ron said that he's sure the networking with other friends groups will bring future positive results. He also came back with a greater appreciation of the volunteer and board members we have involved in TIA.

Building the Refuge: A Great Sacrifice

By Del Bergseth

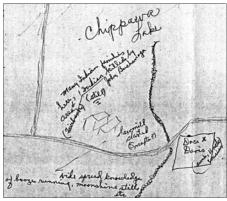
Perusing the written history of Tamarac National Wildlife Refuge is quite enlightening. Many people owned property and farmed the land before the creation of the refuge. A study of an early 1914 plat map reveals hundreds of landowners and many structures inside the refuge boundaries. In the files are numerous pictures of cabins that were moved off the refuge. Further delving into the literature reveals an old hand-drawn map showing the man-made structures near Chippewa Lake. There were numerous farms, homes, a school, a post office, a sawmill, and even a still.

It obviously took much planning and determination to create this refuge. Enormous sacrifices were asked of the people who lived on the refuge at the time of its creation. Some bitterness can still be noted; but, a number of people are proud of their family's sacrifices to create this marvel of nature.

These sacrifices may be for naught, however. What can be called "creeping urbanization" from explosive population

growth is subtly changing this wild area. I have noted that more and more requests have been submitted to allow trails for travel through the refuge. Pressures for these trails are not usually from outside the county, but from within it. That means that the very people who benefit most from the location of the refuge are trying to change it. Sure, small changes here and there might seem innocuous, as seen from the eyes of the special interests encouraging these trails. But taken in their entirety, they can, and will, change the refuge and set a precedent for more change. In my opinion, "trails" is just another word for "development." A busy trail is not compatible with the refuge or its stated mission. Currently, we don't have to travel far to enjoy pristine beauty, but that can change.

Most of you may not plan to go bushwhacking through the woods, but your children or grandchildren may. They could also enjoy a quiet adventure trip through the area by using the already numerous walking trails. In the future, the refuge will be more highly valued than right now since the areas surround-



Hand drawn settlement map.

ing it will be even more developed. Experts note, that since 1980, free space in local municipalities has shrunk by 90%.

Years ago the refuge was known for its ability to produce waterfowl and it is still a resting place for waterfowl on its way south for the winter. The refuge has already become a unique entity in this area and serves as a lone, true wild spot in the region. The generations before us knew the value of wild places and made an effort to create and protect them. Will future generations think the same about us?



Original Refuge Archive Photo Caption:

One of 96 rustic signs constructed by APW workers in 1963 and 1964 out of refuge produced materials. Original homestead trails and building sites have remained remarkably undisturbed through the years. These have been cleared and marked for tourist hiking and sightseeing. With 30,000 refuge leaflets prepared and given circulation in Kansas, Iowa, Illinois, Minnesota, and other areas, it is safe to predict a great increase in recreational uses on Tamarac during the 1964 season. (APW = Accelerated Public Works Program)

Exploring Tamarac's History

he area of Tamarac NWR has a fascinating history which we will continue to feature in each newsletter. New this summer, Tamarac will offer history tours that will begin with a short presentation at the Visitor Center and then travel car caravan-style to a number of non-Native American historic and settlement sights. TIA members exclusively can get in on a first tour from 10 am to 1 pm on June 29. Three tours will be offered to the public in July with more to follow.

These history tours are just part of the planned activities of the new Tamarac History Committee, which a couple of its members would like to call Tamarac History Pioneers. This alternative name comes from the feeling of being explorers or investigators working through the refuge archives (and seeking to protect them), searching out other historical records, talking to people with first-hand or second-hand knowledge, examining old plat maps, and trampling about the woods looking at what remains of an old farmstead. Whatever your age or background, if you want to get in on the adventure, come join our history group. While you're investigating history, you are also a Tamarac Fish and Wildlife volunteer. Contact Kelly Blackledge at the refuge if you want to get involved.

Connecting Children to Nature

Thank you letters and art from Roosevelt Elementary, Detroit

Dear Refuge Staff,

Lakes, Minnesota

My Favorite part was when Ron took us on the Binocular Hike. That was so cool. I learned about otters. squirrels, bear. I really loved that, plus, about the squirrel houses, that was very cool. I may come to Tamarac again some time. Maybe I will meet you there. And that was fun when we learned about squirrels and how they store their nuts. Thanks a lot, that was so cool. Sincerely, Hanna



Contribute to TIA's School Bus Fund

ast year 4,100 children visited Tamarac NWR with school groups. With rising gas prices and strapped school budgets, some schools don't have the funds for Tamarac NWR field trips. TIA has set up a fund to help subsidize bus costs to Tamarac. Please give to this fund and help more children have the opportunity to connect with nature. A contribution form can be found on our website. For questions call TIA at 847-2641, e-mail: busfund@tamaracfriends.org.



Dear Kelly and Staff,

Thank you for letting us visit Tamarac. My favorite part of the field trip was the beaver presentation. Some of the things that I learned I didn't know before. It was really cool to see chewed trees from the beavers. It was really cool! I learned that beavers have nose flaps, ear flaps, and a flap on their throat. Sincerely, Leah.

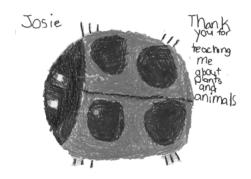
Dear Tamarac Staff,

My favorite was the binocular hike. I think I saw an otter. It was awesome. I want to go again. I wish we saw the wolves. Your friend, Alex.



Dear Kelly and staff,

Thank you for letting us visit Tamarac. My favorite part of the field trip was the tree games because the trees need water and food and sun. And my other one was the binocular hike because I saw a lot of stuff. Your friend, Nathan.



Photographing the Wild of Tamarac NWR

2008 Tamarac NWR **Photo Contest**

he annual Tamarac photo contest will return with only the amateur division. Contest photo categories are wildlife, plant life, scenic, nature's abstracts, and recreation. Each photographer can enter three 5x7 glossy photos. The deadline is August 31. An entry form with information about each photo and photographer contact information will be used this year. Visit the TIA website (www.tamaracfriends.org) for contest information and forms. A contest flyer will be available in the Visitor Center. You can also contact Janice Bengtson at the refuge (218-847-2641).

Digital Photography Workshop

iscover the fun and adventure of photographing wildlife, plant life, and the ever changing scenes of nature found at Tamarac NWR. Our workshop on June 21, is designed for beginners to intermediate photographers of any age with even the most basic digital camera. Starting at the visitor center, we will learn the basic principles of taking good nature photos, see the Tamarac photos of several photographers, and hear some of their secrets. We will then break into groups and travel to different locations on the refuge to take photos. Participants must bring their own digital camera, preferably one with any format of memory card.

Tamarac NWR & TIA Calendar of Events

April 20 - 26	Earth Week		Northern Forest" 2pm	
April 21 - 26	Information, Detroit Lakes Washington	June 5	Guided Refuge Tour 10am–12 noon (meet at Visitor Center)	
April 24	Square Mall Tamarac Volunteer Clean-up It is spring	June 6	Deadline for articles for the Summer TIA newsletter	
clean-up time on the refuge! Let's make this part of Earth better for wildlife and people. 8:30am-12 noon. Meet at the Visitor Center. Lots of jobs to choose from: raking, cleaning the Visitor Center, cleaning feeders, litter pickup, cleaning kiosks and more! Bring gloves and wear clothes you can get dirty! Lunch will be provided by the Tamarac Interpretive Association. Please RSVP to Janice		June 6	Friday Night Frogging 8-10pm Come for a night of frogging. Identify frogs by their calls while learning about their natural history and significance to the ecosystem. Meet at the Visitor Center. Bring a flashlight and boots or shoes that can get wet. We'll tromp through a marsh and get a close up look at some of these cool, green critters.	
	847-2641 ext.16, by Monday, April 21	June 8	Tamarac Sunday Movie <i>Planet Earth Series</i> – "Pole to Pole" 2pm	
May 8 May 10		June 12	Guided Refuge Tour 10am–12 noon (meet at Visitor Center)	
		June 12	TIA Board Meeting, 1 pm	
May 15 – 18	NWR Fishing regulations Detroit Lakes Festival of Birds Please preregister on-line at www.visitdetroitlakes.com for the Festival of Birds or contact the Detroit Lakes Chamber of Commerce at 1-800-542-3992. See article page 4.	June 15	Dragonfly Dreams and Butterfly Kisses 2pm. Join local favorite, John Weber for an intriguing look into the secret world of dragonflies and butterflies. Enjoy beautiful photography along with a short walk to observe these creatures in the wild. Learn about their	
May 15	Global Change in Minnesota Forests 6-7:30 pm. Detroit Lakes Festival of Birds. Dr. Lee Frelich, founder and director of the Center for Hardwood Ecology, will address the effects of global warming on our Minnesota native trees. Fee: \$22 Dinner & Program. This program will take place at The Lodge on Lake Detroit located on Hwy 10 in Detroit Lakes. (Registration information at www.visitdetroitlakes.com)		fascinating lifestyles and their significance in the balance of nature.	
		June 19	Guided Refuge Tour 10am–12 noon (meet at Visitor Center)	
		June 22	Tamarac Sunday Movie "Wolves" 2pm	
		June 21	Nature Photography Workshop, 10am-2pm See article page 10.	
		June 26	Guided Refuge Tour 10am–12 noon (meet at Visitor Center)	
May 16	Prairies: Fuel for Thought, Detroit Lakes Festival of Birds 6-7:30pm, at Fair Hills Resort. Learn how grasslands could be a fuel of the future and what it could mean for bird populations and the ecosystem. Fee: \$25 for Dinner & Program. (Registration information at www.visitdetroitlakes.com) Way 17/18 Visitor Center is now open Sat. & Sun:	June 28	Special TIA Member Event Refuge History Tour 10am-1pm Call the refuge, contact a TIA board member, or e-mail tia@tamaracfriends.org to sign up. Tamarac Sunday Movie "Beavers, the Big-	
		04.10 2 5	gest Dam Movie You Ever Saw!" 2pm	
May 17/10	10 am–5pm	July, August and September event schedule will be available at the Visitor Center and on the TIA website later this summer.		
May 26	Memorial Day Visitor Center Closed	October 4	Tamarac Fall Festival	
May 28	New & Returning Volunteer Orientation New volunteers 9am-12 noon, returning vol- unteers 1-3pm. Lunch included. Contact Janice Bengtson at the refuge to register.	Additional information on each event can be found on our website (www.tamaracfriends.org) or by calling 218-847-2641. Handouts with the Tamarac NWR interpretive program schedule can be picked up at the refuge Visitor Center.		
June 1	Tamarac Sunday Movie "Loons of the	are can be picked up at the reruge visitor Center.		
		AT	U 1110 D 0 DI 040 047 0044	

 $TIA\ Website: www.tamaracfriends.org\ /\ Tamarac\ National\ Wildlife\ Refuge\ ,\ Phone:\ 218-847-2641$

NEWSLETTER OF THE TAMARAC INTERPRETIVE ASSOCIATION

Tamarac National Wildlife Refuge 35704 County Highway 26 Rochert, MN 56578 Website: www.tamaracfriends.org

Phone: 218-847-2641 extension 21

Tamarac Interpretive Association's mission is to facilitate activities and programs that interpret, protect and restore the natural and cultural resources of Tamarac National Wildlife Refuge.

Refuge Website:

www.fws.gov/midwest/tamarac



