Leaving Your Non-Fish Life Behind for Three Days: The 1999 NANFA National Convention in Champaign-Urbana

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We knew we were in for something special the second we pulled into the Jumer's Castle Lodge parking lot and saw the large banner hanging in front of the entrance:

Champaign-Urbana
Convention & Visitors Bureau
WELCOMES
NANFA 1999
North American Native Fishes Association

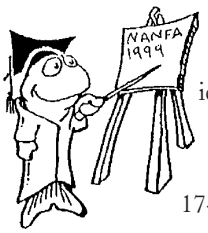
Wow! An official greeting! Formal recognition! NANFA had *arrived*. And the city fathers of Champaign-Urbana were glad to have us. What could be next? A television news crew and an interview? (Actually, yes, but I'm jumping ahead.)

That banner was only a hint of the festive, educational, and celebratory atmosphere of the next three days. Meeting organizer and emcee Elmer Guerri pulled out all the stops to make this year's convention the biggest and best NANFA gathering ever. (Casper Cox had raised the bar way, *way* high with the fabulous 1998 meeting in Chattanooga.) From the moment you walked under that banner and entered the Castle Lodge—a delightfully kitschy replica of a German banquet hall, replete with high ceilings, red carpeted walls, and mounted heads of large mammals staring down at you—you left the non-fish part of your life behind.

Lectures. Slide shows. Videos. Fish tanks. Raffles. Prizes. Auctions. Artwork. Photography. T-shirts. Ball caps. Books. Calendars. Supplies. Workshops. Tours. Food. Beer. Seines. Darters. Minnows. Madtoms. Suckers. Mollusks. Your very own NANFA tote bag. And everywhere you turn, a fellow native fish fanatic.

Indeed, one of the great attractions of these meetings is simply to hang out with other NANFA members. E-mail and chatrooms may be nice, but nothing can replace meeting archimedes@master.localink4.com in person and saying, "Hi, Martin, I'm Chris. Awfully glad to meet you."

Around 50 NANFA members attended the meeting. This article is for the 400 or so who did not. I hope what follows gives you some idea of what we learned and enjoyed.



More importantly, I hope it convinces you to attend this year's meeting, August 17-19, in Jackson, Mississippi.

Tank of Death, Refugium of Life (Part I)

Day One of the convention was Friday, August 6. But some of us arrived the day before and spent an enjoyable evening in the hospitality room getting acquainted and grousing that the beer in the keg was flat. (We drank it anyway.) Five

aquariums were set up, containing a number of local fishes. B. G. Granier brought some bluenose shiners up from Louisiana, but they started acting stressed after being released into one of the tanks, which apparently had crashed. So B. G. moved them to the refugium of the Algal Turf Scrubber (ATS)™ tank that Morgan Lidster of Inland Aquatics had set up in the hallway. To our amazement, the shiners quickly recovered.

Before B. G. moved his shiners, a news crew from one of the local stations showed up to do a story on the meeting. Larry Page was "volunteered" for the on-camera interview. Author of *Handbook of Darters*, co-author of the Peterson *Field Guide to Freshwater Fishes of North America*, Principal Scientist at the Illinois Natural History Survey, and former NANFA Board member, Dr. Page was the perfect spokesperson for both the fishes and the club. Yet I didn't pay any attention to a single word he said, for I was transfixed by the sight of spinning, gasping, dying bluenose shiners directly behind his shoulder.

Oh no! Dr. Page was sitting within camera view of the bluenose tank of death! "Stop the interview!" I wanted to shout. But I just held my tongue and downed another cup of flat beer. None of us saw the interview on TV that night, nor have any of us attempted to get a tape. I just hope those near-dead bluenoses were too far in the background to be in focus.

Breakfast, and Lots of Algae

Day One proper began with continental breakfast in the meeting room. Some of us, however, forgot that breakfast was being supplied, so we gathered in Jumer's restaurant and chowed down at their breakfast buffet. After about the fifth waffle, I dragged myself into the meeting room just in time for the first speaker to begin. Fortunately, there were plenty of bagels and donuts left for pre-lunch grazing. And B. G.'s bluenoses were still alive.

James Gammon of DePauw University, kicked off the day's talks with his presentation, "Fishes of the Wabash River, Indiana." Snaking 475 miles across the state, the Wabash is Indiana's second largest river, and the one body of water Dr. Gammon has devoted his professional life to studying.

Thirty years on the Wabash has taught Dr. Gammon that fishes are not the most important organisms in the river. That distinction belongs to algae. "They determine how many and what types of creatures live here," he said.

In fact, the Wabash's characteristic dirty, brown color is not the result of sediment. It's simply the color of the algae in full bloom. The Wabash contains so much algae—as many as 10,000 cells per drop of water—that light penetrates only 20-25 cm. The fish live in total darkness. Sport fishes such as bass and walleye, which feed by sight, don't thrive in the murky waters. Other fish are affected by the low levels of dissolved oxygen. At night, when there's no photosynthesis, the algae consume the oxygen the fish need to breathe.

Why is there so much algae? The answer is nutrients from agricultural runoff. What's more, farmers have pushed their farms to the very edges of the river, cutting down the riparian vegetation—namely, trees—so crucial to stream health.

"Almost every tributary we have is polluted from the very first drop that enters the stream," Dr. Gammon said.

Nevertheless, Dr. Gammon has seen improvement in the Wabash's fish communities. And he is optimistic that the river will continue to rebound if runoff is more stringently controlled, and if riparian vegetation is replaced on a large scale.

Dr. Gammon's talk wasn't all about algae. There were plenty of fishes, too. Ninety-six species have been recorded from the middle Wabash, some of which have recently expanded their ranges into previously unoccupied areas of the river.

The next speaker was Michael Retzer, an ichthyologist with the Illinois Natural History Survey, and author of "Fishes of the Mackinaw and Vermilion River Systems in Illinois" (Summer 1999 *American Currents*).* Today, Dr. Retzer limited his discussion to fishes of the Mackinaw, illustrating with slides how fish assemblages change as we move from the headwaters, down to the gravel and cobble runs, and into the sandy reaches where the river valley opens up to form a floodplain. One of Dr. Retzer's findings appears to mirror one of Dr. Gammon's: A lot of the larger river species, like mooneye, are moving into previously unoccupied areas, in this case smaller streams. No one knows why and what effect it will have on the aquatic community.

Too Many People, Not Enough Trees

Dr. Retzer was followed by his boss, Dr. Larry Page. Not one to pull punches, Dr. Page prefaced his talk on the fishes of the Middle Fork of the Vermilion River (and Illinois fishes in general) with some sobering words:

"We have to keep in mind that we have in Illinois, and Indiana, and in the entire United States, no unaltered aquatic ecosystems. Everything is degraded to one point or another. . . .

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* Perhaps this is a good place to note a correction and make an addition to the list of fishes that accompanied Dr. Retzer's article. Under Cyprinidae, the common name of *Macrhybopsis aestivalis* should read speckled chub, not speckled shiner. And under Percidae, the dusky darter, *Percina sciera*, is missing. The dusky darter is found in the Vermilion River but not the Mackinaw River.

There is nothing around anymore that is comparable to what was around 100 years ago. We're making some improvements in various areas, but it's very sad, I think, that there's nothing left in this country that we can call pristine. . . .

"Jim [Gammon's] optimistic about things to come. I'm pessimistic. I say that to groups. I say that to my class. And to be quite blunt, people get pissed off when I say that, because they think that's a very bad attitude, [and] that we have to remain optimistic and work as hard as we can to restore and make things better. I agree with that. But in many ways we're just dealing with the symptoms of the problem. And the problem is overpopulation. There are too many people. . . . If we're really going to deal with environmental problems in this country, we're going to have to talk about the fact that . . . we cannot keep having more and more people and expect other species to deal with [all] the people. . . .

"I always feel obligated to at least bring up that problem. Those of you who write me the nasty letters, [I say] fine."

Dr. Page's survey of Illinois' fishes lends overwhelming evidence to his claim, though the numbers may be misleading. At the turn of the 19th-century, 187 reproducing fish species were recorded in Illinois. At the end of the 19th-century, Dr. Page and his colleagues recorded 176, a drop of six percent.

Six percent. That's not so bad, is it? What's misleading about that number is that while 94 percent of the fish species may still be around, *Illinois has lost 99% of its natural landscape*. Many Illinois fish species are clinging on in small, fragmented, and vulnerable populations. Should a natural event like a drought harm one of these isolated populations, there may not be enough fish for the species to bounce back.

"We're likely to lose species like this in the near future," Dr. Page said.

Dr. Page then talked about how the loss of riparian vegetation increases the frequency and intensity of floods. Under natural conditions, rainwater percolates slowly through the soil, seeping into the headwaters that serve as prime habitat for many minnows and darters. But with all the trees cut down for farmland, rainwater runs off very quickly into the main river channels, creating large floods that people think are "natural," but are, in point of fact, entirely manmade. What's more, many headwater creeks dry up because the floods wash their water away.

"There's nothing more important we can do to restore streams," Dr. Page said, "than to replace riparian vegetation."

Dr. Page closed his talk by showing slides of the fishes we would encounter during tomorrow's collecting trip to the Vermilion, perhaps the healthiest stream in Illinois.

"The Silence of the Clams"

That was what Kevin S. Cummings subtitled his talk, "Mussels in Illinois: The Role of Mussels in Stream Ecology." This was the funniest of the day's presentations, and for me—someone who walked into this meeting knowing next to nothing about mussels—also the most enlightening.

As Mr. Cummings, a malacologist with the Illinois Natural History Survey, so colorfully explained, the relationship between mussels and fish is a close one. North America has the most diverse freshwater pearly mussel (unionid) fauna in the world. All of them, except for one, require a fish to serve as an intermediate host for the larval form, called glochidia. The glochidia attach to the gills or fins of a particular fish species, where they encyst for several days or weeks before metamorphosing into juvenile mussels. What's amazing is that mussels have evolved incredible "fishing lures" to attract hosts and ensure that the glochidia become attached. Mr. Cummings' slides illustrated some of these remarkable adaptations. Some mussels develop membranous capsules, or ovisacs, that mimic prey items like chironomid larvae and hellgrammites. Host fishes, including darters and basses, take a bite of these ovisacs, and glochidia are released. The glochidia are harmless to the fish. In fact, some evidence suggests that once a fish serves as a host, it builds up an immunity to subsequent glochidia "attacks."

Some mussel species bind numbers of glochidia into long mucus forms called conglutinates. Others bind conglutinates together to form superconglutinates. The orangeacre mucket (*Lampsilis perovalis*), a federally endangered mussel from the Mobile Basin, produces a superconglutinate that's up to eight feet long! Mr. Cummings showed a slide of this mussel being held out of the water. It's superconglutinate (or "snot string," as he called it) was a meter long. Dancing in the riffles, the end of its jelly-like tube resembles a wounded minnow. Along comes a hungry redeye bass and, hello, another generation of muckets find a place to grow.

Mr. Cummings then discussed the commercial harvest of unionids to make buttons, and their conservation status. Of the 297 freshwater mussel taxa described from the U.S., 21 are extinct, 77 are endangered, 43 are threatened, and another 72 are vulnerable or of special concern. That's 72 percent of our country's mussel fauna either gone forever, or heading that way. Some species are gone, Mr. Cummings explained, because their host fish is wiped out.

With images of the orangeacre mucket "snot string" dancing in our heads, we broke for lunch in Jumer's main dining

The 1999 NANFA National Convention was brilliant, dazzling, and most of all, very fun! I am honored to have met people like Larry Page, Bill Roston, and James Gammon. I especially enjoyed Larry Page's talk and his emphasis on treating what causes stream pollution rather than treating the symptoms. I don't think he was being negative; rather, he's realistic, for if you are going to fix the problem, you have to be realistic! All the talks, however, were very informative!

Anyway, I want to thank Mr. Randy Sanders from Ohio Department of Natural Resources/Division of Wildlife for taking time to be a guest speaker. Thank you, Randy! I would also like to acknowledge the presence of Mark Binkley and Jeffrey Hildebrand. My only regret was that I had to leave halfway through. Elmer Guerri, I don't know how you do it! Great job with getting our attention (letters, notices, etc.).

Finally, I would also like to say it has been a pleasure *meeting people that I've often heard about, talked to on the phone, or wrote to. Ray Katula, I wish I had more time! Mike Thennet, I'll get you those ideas. Jay DeLong, thanks for the brochures. Chris Scharpf, thanks for* AC. *Anyone else I had talked with, I am also glad to have met you. I look forward to next year. I know I'll be there!*

Oh, by the way, I hope whoever won the "Triassic Triops" kits knows what do do with it. They're terrific.

Sincerely and respectfully, to NANFA and its members,

Robert S. Carillio, Ohio NANFA

Ed. note. The triops went to Casper Cox. "They're for my boy," he said. Sure, Casper, whatever you say.

hall. B.G.'s bluenoses, by golly, were still alive. Several, in fact, had fled the refugium and were swimming contentedly with Elmer's longear sunfish. The longears paid the shiners no mind, reminding me that bluenose shiners are nest associates of longear sunfish.

Can Fishes and Farmers Live Together?

So far, the talks had largely been about biodiversity and habitat loss in the agricultural Midwest. The first three talks after lunch were about some of the ways concerned individuals and organizations are working to prevent more losses, and restore river conditions as much as possible to what they once were. Diane Rudin of The Nature Conservancy (TNC) began the afternoon by discussing efforts to protect the Mackinaw River watershed. First, she placed the issue of fishes, farmers, and land use into the proper social perspective:

"Most of the folks [around here] grew up thinking of rivers and streams as drainage ditches. . . . It's not that they wouldn't change their ways. It's that they don't know how to do anything but grow crops . . . . And so, given that, it is a far more complex social problem, as well as an environmental problem, that we face in the Midwest."

Since it's impossible to purchase an entire watershed, TNC is instead working with private landowners to help them become better stewards of the land. Under the auspices of the Mackinaw River Partnership, the TNC is leading several community driven projects to help stabilize badly eroding streambanks and reduce stormwater flooding.

"It's a lot more expensive to restore habitat," Ms. Rudin said, "than it is to protect."

A Sanctuary, a Survey, a Sign of Hope

The next speaker, Jim Bland, spoke about Prairie Crossing, the first endangered and threatened fish sanctuary in Illinois. Here four state listed species are being raised: blackchin shiner, blacknose shiner, Iowa darter, and banded killifish. Broodstock of the four target species were collected in the fall of 1998. Beaming like a proud daddy, Mr. Bland announced that all four species were producing thousands of babies at Prairie Crossing, and that future introductions of other species are being planned.

Jim Bland was followed by Randall E. Sanders of the Ohio Dept. of Natural Resources. Author of the upcoming *A Guide to Ohio Streams*, Mr. Sanders talked about a statewide stream survey of Ohio fishes that he and his colleagues had recently completed. Comprising 13,164 collections made at 4,419 sites in 961 Ohio streams between 1979 and 1995, the survey recorded the occurrence and relative abundance of Ohio's fishes. The most frequently occurring Ohio fish is the creek chub. The most abundant fish is the central stoneroller.

Mr. Sanders then went on to list some of the ways his agency and others are working to improve habitat and the state's fish diversity. He commented briefly on the proliferation of local watershed groups (there are now 85 of them in Ohio); controls placed on point-source pollution and the dramatic reduction of ammonia in Ohio's waters; dam removal; working with developers to modify drainage practices; and the acquisition of land surrounding Ohio's only population of wild brook trout, and efforts to breed these trout and reintroduce them into other streams (see the article on page 35).

"None of this was going on 20 years ago," Mr. Sanders said—an encouraging sign of hope that things are moving, albeit slowly, in the right direction.

Keeping and Breeding Natives: A Brief Notice

The next three talks shifted the focus from fishes in the wild to fishes in aquariums. However, I am not going to summarize their content here. Since these talks were derived from or contained information available in previously or soon-to-be published articles, I refer you to the published sources.

James Sternburg, Professor Emeritus at the University of Illinois, has been captivated by redbelly dace ever since he saw one when he was a little boy, at a pet store in Chicago in 1928. The years have not diminished his enthusiasm. Dr. Sternburg's talk and video presentation (shot by NANFA member Claude Daniel) clearly demonstrated that redbelly dace are among the most spectacular aquarium fishes in the world. For more information, see his three excellent articles on *Phoxinus* in *American Currents*: "Aquarium Spawning and Rearing of the Southern Redbelly Dace" (Oct. 1986); "Aquarium Spawning of the Mountain Redbelly Dace" (Fall 1991); and "Spawning of Southern and Northern Redbelly Dace Compared" (Winter 1992-1993). The third article is available at NANFA's website.

Ray Katula, arguably the world's greatest native fish aquarist, spoke on "Captive Propagation of Native Fishes: Darters, Minnows and Killifishes." Mr. Katula's been keeping and breeding natives since 1970, when he was just 11 or 12 years old. His tremendous skill (and patience!) is evidenced by the long list of fishes he has spawned and reared since that time. Mr. Katula's presentation consisted primarily of excerpts from upcoming articles for *Tropical Fish Hobbyist*, one of which has just appeared (see page 32 for a summary).

Morgan Lidster of Inland Aquatics spoke on algal turf scrubbing, a subject covered in Elmer Guerri's two articles in the Spring and Summer 1999 issues of *American Currents*. However, Mr. Lidster did not have to say a word. The stunning ATS™ tank he set up in the hallway—and B. G.'s bluenose shiners—did all the talking for him.

You Can Stab a Bowfin, But You Can't Seine It

The final talk of the day elicited the most vociferous response from the audience. Glenn Kruse, Endangered and Threatened Species Program Manager for the Illinois Department of Natural Resources, spoke on his state's fishing regulations. As it turns out, recreational fish collectors in Illinois are limited to what they can take and how they can take it. What's frustrating is that many of the rules do not make any sense. Here's a quick review:

- A sport fishing license allows you to take by hand or hook-and-line any non-protected species. ("By hand" means just that—your bare hand.)
- Cyprinids (except for carp and goldfish) may be taken by seine or trap. (Mr. Kruse doesn't know why carp and goldfish are excluded, although they may be taken by hook-and-line. The best guess is that carp and goldfish were considered sport and/or commercial fishes, while other cyprinids are bait fishes.)
- Dipnets are allowed for taking carp, buffalo, carpsuckers, smelt, and shad.
- Carp, buffalo, suckers, gar, and bowfin may be taken by pitchfork, underwater spear gun, and bow and arrow. (Everybody laughed at the pitchfork, but it makes sense; in olden times that was probably an easy way for a farmer to snag a meal in shallow water.)
- You must possess an aquaculture permit to propagate any wild-caught Illinois fishes. (So if your legally seined bluntnose minnows spawn in the aquarium on their own, then you are technically breaking the law! Mr. Kruse believes this law was written for catfish farmers, but the *way* it's worded makes it apply to *all* Illinois fishes.)

What becomes clear from a literal (and legally accurate) interpretation of these rules is that it's illegal to possess such aquarium favorites as darters. And it's illegal to possess other fishes, such as gar and bowfin, if they are collected by nets. Or, as Carolyn Nixon noted, "You can hurt it, but you can't take it without injury."

Why are these laws so . . . so . . . dumb? The answer, as Mr. Kruse explained it, is quite simple. They were written by lawmakers who had no idea that someday people might want to keep nongame fishes alive in home aquaria.

"Darters fell through the cracks," he said, "but no one knew the cracks were there."

Changing these laws is possible. The trick is finding one legislative sponsor who is sympathetic to your cause. He or she can usually push the law through simply because the other legislators don't care, or because lawmakers regularly "swap" votes ("I'll vote for your pet piece of legislation if you vote for mine.") The process, unfortunately, is a slow one.

"There are two things you never want to see [being] made," Mr. Kruse said, recalling an old maxim.

"Sausage. And laws."

Pickled Fishes and Pizza

Phew! Eleven talks (plus lunch) in 10 hours. And the day was just beginning! Elmer had much, much more planned for us. Some people stayed at Jumer's to hear Dr. William Roston talk about in situ fish photography, and to show some of his videos. The rest of us caravanned over to the University of Illinois for a fish I.D. workshop, led by two of Larry Page's graduate students, Tom Near and Jason Knouft.

For the next 90 minutes or so, we pulled fishes preserved in 70% ethanol out of jars and stuck them under our scopes. Dr. Page patrolled the lab, collecting three dollars from each of us to pay for the pizzas that arrived shortly thereafter. With a slice of pepperoni in one hand, and a dissecting needle in the other, we learned the intricacies of counting fin rays and lateral line scales. More than one of us joked about using a pickled shiner as a surrogate anchovy.

From here it was back to the hotel for a quick shower, then down to the hospitality room for another (fresher) keg of beer, and the fabulous NANFA auction. Phil Nixon served as auctioneer and had his work cut out for him. Over 100 items were auctioned off, bringing in $1546 to benefit NANFA. Our thanks to everyone who bid, and, especially, to all of our generous donors (see Table 1).

In the Stacks and in the Vermilion

Day Two began with a continental breakfast supplied by NANFA's Illinois-Indiana Regional Chapter. Then we headed over to the Illinois Natural History Survey for tours of their preserved fish and mollusk collections. Formed in 1858, the Survey is one of the oldest in North America. Its fish collection has over 800,000 specimens from Illinois and around the world, making it the 15th largest fish collection in the country. Here Larry Page showed us specimens of such rare fishes as the harelip sucker, which was extinct by 1905, and the Maryland darter, last seen in the wild in 1988 and presumed extinct.

Kevin Cummings showed us the mollusk collection, giving him another chance to discuss these fascinating and little-known creatures.

"Food is one of the biggest holes in the biology of this group," he told us. "It's still a real mystery of what these guys are actually eating. They pass a lot of stuff through [their digestive systems], but what [food items] are they actually utilizing?" No one knows for sure.

Mr. Cummings explained that while funding for the study of native mussels is in short supply, there seems to be plenty of money to study the zebra mussel, a widespread exotic.

"The zebra mussel thing really gets my goat," he said, "because . . . they're never going to get rid of it. Let's face it. The barn door's closed and the horse is out, right? [But] they'll study allometric growth in caged versus uncaged zebra mussels. *Who cares?* We're going to have zebra mussels around for the next 300 years to study that stuff. We *won't* have [native mussels] around to study the stuff we need to know before they disappear."

After a quick trip back to the hotel to collect our collecting gear, we set out to the Middle Fork of the Vermilion (back cover photo). Illinois' short-sighted restriction against collecting darters didn't keep us from stocking our coolers with greenside, rainbow, slenderhead, and dusky darters (Dr. Page's scientific collecting permit took care of that). All told, we sampled 38 fish species, including the state endangered bluebreast darter, which we admired and released unharmed.

Tank of Death, Refugium of Life (Part II)

Back at the hotel, Casper Cox placed some of his fishes from the Vermilion into the tank of death, thinking, as we all did, that an earlier water change had fixed whatever had caused it to crash the day before. We were wrong. A short while later, Casper's minnows, darters, and madtoms were swimming erratically, spinning, and turning belly-up.

"The refugium!" somebody yelled, as if calling for 911. I grabbed a net, scooped out the survivors, and ran them over to the ATS™ tank. I didn't think they were going to make it, but in 20 minutes or so, the near-dead fish were righting themselves and breathing easier. Once again, we were amazed.

During all of this, someone complained of an insect bite or a spot of poison ivy.

"Dip it into the refugium," I said. I was only half-kidding.

At dinner, we each had a chance to win a refugium as a special prize for Convention attendees only. But that honor went to James Graham of Hastings, Michigan.

Table 1. NANFA thanks the following people, organizations, and companies for their generous support of the 1999 NANFA National Convention.

Inland Aquatics for the 75-gallon aquarium, and Algal Turf Scrubber system with drop-in refugium unit

Ecological Systems Technology, L.P., Walter Adey and Karen Loveland, for 2 copies of *Dynamic Aquaria*

Rainbow Lifeguard Aquarium Products, Neil Delaney, V. P., for the 25 Watt QL25TH-3/4" UV Sterilizer

Joseph R. Tomelleri for the fish prints

Ken McKeighen, Jr. for the native fish oil paintings and watercolors

All Glass Aquarium for the polo shirts

Aquadine, Inc., Robyn Kauth, V. P., for the 3-lb. bags of Freshwater Hi-Pro Duraflake and Spirulina Duraflake

Aquaria-Marineland for the Eclipse System-6 aquarium

Aquarium Systems for the Quick Sand Fluidized Bed Biological Filter, and the "Fancy Plants" plastic aquarium plants

Bagelman's Bakery for the bagels and cream cheese

Barron's Educational Series, Inc. for a copy of *North American Native Fishes for the Home Aquarium* by David M. Schleser

Beich Candy Company for the 60 candy bars

Blackwell Science, Inc. for a copy of *The Diversity of Fishes*

John Brill, Pearlfish Press for the 1999 and 2000 calendars, and the matted fish prints

Robert Carillio for various aquarium products

Delorme Mapping for the *Illinois Atlas and Gazeteer*

Energy Savers Unlimited, Inc. for "The Screamer" emergency overflow alarms, and the canister filters

Fish World of Eufaula, Alabama, for the t-shirt, cap, and set of 3-D Photo Lures

Fishsoxx, Carol Shroeder, for the mousepads

Fish-Vet, Inc. for the Hobby-Vet Fish Disease and Toxicology Diagnosis Computer Program

Florida Tropical Fish Farms Association, Inc. for a set of VHS videos on fish health management

Mindy Gardner for the native fish decoys

Hikari Sales USA, Inc. for the fish food samples

Indiana Division of Natural Resources, Gwen White, for the stream quality posters

Jungle Laboratories for the assorted sample chemicals

Kent Marine for various aquarium products

Lee's Aquarium & Pet Products for the Gravel Vac

Leo S. Long for the hand-carved wooden bluegill statue

Marine Enterprises for the Crystal Sea salt

Memphis Net & Twine for the Delta-KS4 seine

Maurice F. Mettee for an autographed copy of *Fishes of Alabama and the Mobile Basin*

Miami Seaquarium Gift Shop for the t-shirt

Missouri Department of Conservation for *Fishes of Missouri*

D. Martin Moore for assorted software and fossilized dinosaur poop (gee, thanks, Martin)

Phil & Carolyn Nixon, Illinois Natural History Survey, for an autographed copy of *Field Guide to the Freshwater Mussels of the Midwest*

North Carolina Aquarium Gift Shop for the cap

Ohio State University Press for a copy of *The Fishes of Ohio*

Al Ochsner for the fish art and fish t-shirts

Larry Page, Illinois Natural History Survey, for 3 copies of the Peterson *Field Guide to Freshwater Fishes of North America*

Pepsi Cola/Champaign-Urbana Bottling Company for 2 cases of Pepsi products

Pets Ltd., Scott Clark, for the gift certificate

Petsmart, Jim Brown, for 1 auction item & plastic bags for the prizes

Pet's Paradise, Randy McDaniel, for 6 aquarium nets, 1 fluorescent hood, 1 air pump, 2 air stones, and 1 power filter

Pet Warehouse for the powerheads, chemicals, and test kit

Prairieland Feeds for the 50-lb. bag of fingerling fish food

Rolf C. Hagen Corp. for the Trio 3000 internal filter, various water conditioners, Flora Care Plant Gro Fertilizers, Nutrafin Max goldfish food, and aquarium background

William Roston for the fish photographs

Seachem Laboratories for Ammonia Alert, chemicals, and posters

Southeast Aquatic Research Institute, George Benz, for a copy of *Aquatic Fauna in Peril: The Southeastern Perspective*

Sportsman's Atlas Company for 2 copies of the *Sportsman's Atlas*

T.F.H. Publications for *Text Book of Fish Health*, *Handbook of Fish Diseases*, *Axelrod's Atlas of Freshwater Aquarium Fishes* (9th ed.), and subscriptions to *Tropical Fish Hobbyist*

Tennessee Aquarium Gift Shop for the t-shirt

Tetra Pond Products for the Green Free UV Clarifier

Texas State Aquarium for the t-shirt

Michael Thennet for the protein skimmers

Two Little Fishies, Inc. for Sea Veggies Cichlid Flakes, and Florasan Full Spectrum Freshwater Supplement

University of Chicago Press for a copy of *Fresh Water* by E. C. Pielou

University of North Carolina Press for a copy of *Freshwater Fishes of the Carolinas, Virginia, Maryland & Delaware*

University of Tennessee Press for a copy of *The Fishes of Tennessee*

University Press of Kansas for *Fishes of the Central United States*

University Press of New England for a copy of *Pond & Brook: A Guide to Nature in Freshwater Environments*

Peter Unmack for the "Fishes of Arizona" posters and *Fishes of Death Valley* books

Ye Olde Donut Shop for the hospitality room donuts

Now it was time to draw the winners of the 1999 NANFA Raffle. Over $1300 worth of tickets had been sold, and they were all in the big dipnet Elmer was carrying around the room. I crossed my fingers as the winners were drawn.

Sixth prize, a set of Ken McKeighen paintings, went to Martin Moore, who was present to accept his prize.

Fifth prize, another set of McKeighen paintings, went to T. C. and P. K. Parry from the University of California.

Fourth prize, a set of Tomelleri killifish prints went to . . . Martin Moore again! (Cries of "Fixed! Fixed!" were heard.)

Third prize, a set of Tomelleri darter prints, went to Dean Pasker of Wyoming, Illinois.

Paul F. Heizel of Concord, California, was awarded the second prize, a U.V. sterilizer.

And the winner of the grand prize, a 70-gallon aquarium outfitted with Algal Turf Scrubber™ technology, was Ken Wintin, from the Arizona-Sonoran Desert Museum in Tucson, Arizona. Ken was present to claim his prize, and to thank his boss, NANFA member Barbara Terkanian, for picking up his Convention registration and airfare tab.

"Stayin' Alive, Stayin' Alive"

After the raffle it was time to settle in for some video entertainment. Dr. William Roston had brought hours of his underwater videos of spawning minnows, suckers, and studfish. These are nothing like home aquarium videos, which feature one or two fish spawning over a rock or clump of java moss. These are videos taken in the wild, with hundreds of fishes swimming and spawning in the current, creating a dazzling riot of color and life. The fact that footage like this is rarely if ever seen on television nature programs is downright criminal. Enough "Shark Week" already! How about "Shiner Week?"

Larry Page then showed a series of darter and minnow spawning videos as he lectured on the diversity and evolution of their reproductive strategies. While he was speaking, a funny thing happened. In the room next to ours, a 20-year high-school reunion was taking place, and their music was *loud*. During some Bill Roston video of a male bluehead chub building his mound nest, the Bee Gee's "Stayin' Alive" started blaring from the other room. The lyrics provided a comic, almost surreal, counterpoint to the video:

"Oh, you can tell by the way I use my walk,
"I'm a ladies man, no time to talk . . ."

I'm not sure if Dr. Page got the connection because he was so busy narrating, but the rest of us almost died from laughter.

The Mackinaw, Thank You, and Goodbye

Day Three began with me sleeping late—late enough for me to miss Ray Katula's video of his ashy darter spawning. After Peter Unmack's video (shot by our friend Tom Webster) on Ash Meadows and the Devils Hole pupfish, we collected our collecting gear again and set out for the Mackinaw River, slightly over an hour's drive away. Unfortunately, our long convoy of cars got split into two while getting out of downtown Champaign. Stopping once or twice to ask farmers for directions, we eventually found the Mackinaw. The rest of the group was with Diane Rudin of The Nature Conservancy, who was leading a nature walk. I was disappointed that I missed her tour.

After collecting in one section of the Mackinaw for a while, we broke for lunch and met up with the rest of the group at a picnic area on Bloomington Lake. From there we convoyed to another part of the Mackinaw. Here the water was fast and fun, as was a rope swing attached to a tree.

Back at the hotel it was time to pack our fish, clean up, say our goodbyes to friends old and new, and prepare for the voyage back to the regular, non-fish part of our lives.

I don't know what they do at guppy meetings. Or betta conventions. Or koi club socials. But I bet they don't learn how to count dorsal fin rays while chowing on pizza. Or poke behind-the-scenes at one of the top ichthyology labs and fish collections in the country. Or watch videos of fish going at it to the thumping strains of disco. We do some serious learning at NANFA conventions. But we also have some serious fun.

Meetings like this don't just happen. They're planned. A tremendous amount of logistics and just plain grunt work is required. So let me say it here that Elmer Guerri made the 1999 NANFA Convention the success that it was. Sure, he had a lot of help and excellent speakers —

Judy Behny. Tony Berry. Jim Bland. Kim Cook. Casper Cox. Kevin Cummings. Jay DeLong. Jim Evinger. James R. Gammon. Joe Gardner. B. G. Granier. Michael Hardman. Ray Katula. Jason Knouft. Glenn Kruse. Morgan Lidster. James Mensching. Thomas Near. Phil & Carolyn Nixon. Larry Page. Mike Retzer. Bill Roston. Diane Rudin. Randy Sanders. James Sternburg. Michael Thennet.

— all of whom deserve our deepest thanks.

But Elmer was the ringleader. The rainmaker. The man who made me and 50 others forget the non-fish part of our lives for three days, and have a wonderful time.

Thank you, Elmer. Words cannot express the standing ovation you deserve.