People of the Sturgeon: Wisconsin's Love Affair with an Ancient Fish Tom Wirth Oral History Date of Interview: February 21, 2008 Location: Unknown Length of Interview: 01:18:20 Interviewer: RB – Ronald Bruch Transcriber: NCC Ronald Bruch: That's mostly a big fish district, but they're fish from Winnebago.

Tom Wirth: Is that right? I'll be darn then.

RB: We found out now with our telemetry that 90 percent of the males and females that are going to spawn – and you probably knew this before – they move out in the fall and move up the river.

TW: I didn't know that. No.

RB: Yeah. They moved out of Winnebago right about the beginning of bow season.

TW: Yeah.

RB: And by the end of gun season in June, they're out.

TW: I'll be darn.

RB: Most of them, 90 percent. The ones that move out early, most of those keep going up to the river.

TW: Yeah.

RB: But now, there's some of those, and then those that move on to December and January, they spend the rest of the winter in the upper lakes, and they're feeding on gizzard shad.

TW: They're gone, yeah.

RB: Now, back in your day, do you recall seeing any gizzard shad?

TW: No, we didn't have any gizzard shad back in those days.

RB: You didn't.

TW: No. They just came in the lake, I think, about 1960 or somewhere around.

RB: Really?

TW: Yeah.

RB: So, you knew that they were coming, or you had some evidence?

TW: Well, I had heard since then that they were out there.

RB: What do you think? Do you think they came down?

TW: I have no idea how they got in there. So, somebody might have stocked him. I don't know.

RB: Because (Doug Morissette?) had some records when he was – he was a biologist there for a while.

TW: Yeah, he was around there for a while. Yeah.

RB: He had found some memos in the file, where he thought they came down the Fox River.

TW: There's a possibility, yeah. They were in the Wisconsin River, of course. Yeah.

RB: They are very, very important forage fish now.

TW: I'll be darn. Yeah.

RB: The sturgeon eat them like crazy in the wintertime.

TW: Yeah. I remember hearing that when I was up there sturgeon spearing.

RB: They still get most of their carbon from [inaudible].

TW: Yeah.

RB: But they get a lot of it also from gizzard shad.

TW: I see. I'll be doggone.

RB: As a matter of fact, the gizzard shad have probably buoyed the population. Because it appears that we're at carrying capacity now on the Winnebago pool –

TW: Yeah?

RB: – for holding the sturgeon. We've got such population growth. Well, back in your day, you were estimating maybe ten thousand.

TW: Yeah. We figured there might have been ten thousand sturgeon there, spearable size.

RB: Harvestable size. Right now, we're probably running sixty thousand.

TW: Boy, that's quite a change, big change.

RB: Right. One of the things that we think helped that change was the cloudier water in the [19]60s and [19]70s.

TW: Is that right?

RB: Yeah,

TW: What caused the water to be cloudy?

RB: Well, we think nonpoint pollution.

TW: Is that right?

RB: Yeah.

TW: I'll be doggone.

RB: I don't know if you recall about the time that you were there, the vegetation was disappearing on the upper lakes. Our [inaudible] worked there.

TW: Yeah, that's right.

RB: Now that we got the benefit of hindsight looking back, that collapse of vegetation on the hills of that was more turbid water years, more algae blooms.

TW: Yeah?

RB: But what it did was suppress the sturgeon harvest rates in the wintertime.

TW: For crying out loud, yeah.

RB: Nonpoint pollution saved the sturgeon.

TW: I'll be doggone. We figured that the reason we had such poor visibility in the wintertime was because of the several species of algae that grew in the lake under the ice.

RB: Right.

TW: They were – I can't think of that group.

RB: Blue greens?

TW: No, not the blue green.

RB: No.

TW: These were -

RB: Blue diatoms.

TW: Diatoms. Big diatom bloom under the –

RB: Big diatoms under the ice.

TW: Yeah. That would make the waters turbid. You couldn't see through there.

RB: Well, that saved the sturgeon.

TW: It could be, yeah.

RB: It truly did. Because the harvest rates in the [19]60s, [19]70s, and [19]80s were only about six hundred fish a year. The population was able to grow in a short period.

TW: Sure. Well, I figured that the reason the sturgeon population – the reason there's so many people spearing sturgeon nowadays is that the DNR got a little bit hoggish, and they put the sturgeon tag on with the – what do you call that big license that you buy for \$100?

RB: What, the conservation patron?

TW: Yeah.

RB: We took that off.

TW: That's a good thing, yeah.

RB: We took that off about four years ago.

TW: Because it used to be strictly a local fish, sturgeon spearing. All of a sudden, DNR put that on there. All these guys that are friends of mine that are in Madison, all of a sudden they wanted to go sturgeon spearing because they got this free licensing – or their patron license, they got. That was bad news.

RB: Yeah. We did see a big increase in effort at that time.

TW: Sure, yeah.

RB: Just by coincidence, (Dad?) sent me [inaudible] all these fish, and they had some really high harvest, three thousand fish harvests.

TW: I remember that.

RB: So, we had to start clamping down with more regulations. But you were probably the author of a lot of those regulations in the [19]50s then, I would guess.

TW: Well, we started monkeying around with the size limit. Then all of a sudden, we didn't worry too much about that. We decided then that the thing to do was to go with the season length. Season length will do more good than the size limit.

RB: That's been our attack too. In fact, we lowered the size limit. Because what we found was when we went to 45, we saw a big shift in the proportion of larger fish in the harvest. Most of the larger fish were females.

TW: Yeah.

RB: We thought we might be over harvesting the female.

TW: Sure. Yeah.

RB: Turns out we were.

TW: Yeah.

RB: We were over 5 percent. Basically, that was our guide from you that we were over that. So, we felt that wasn't a good thing.

TW: Yeah.

RB: So, we lowered the size limit to 36 inches, and it took the pressure right off of them.

TW: That's a good idea, yeah.

RB: But even just as importantly, maybe more importantly, like you thought, we kept decreasing the season length.

TW: Yeah, that was the only way to get rid of the – to lower the take.

RB: Right. Then we finally went to the harvest cap, which basically we get to a certain number, then shut it down.

TW: Yeah, that will do it, yeah.

RB: We started it in [19]97, and that's worked really well. Then we have the half day seasons now too.

TW: Yeah, that's right.

RB: They can only spear from 6:30 a.m. to 12:00 p.m.

TW: The barber I got here, he was up there, ever since he got his license with a -

RB: Patron?

TW: Patron license -

RB: [inaudible]

TW: He said he [inaudible].

RB: Yeah. But most of the people seem to like the six hours.

TW: Yeah.

RB: Because I've had a lot of guys come up to me. They'll come with their buddies. After spearing, they'll have a drink at the bar or whatever.

TW: Sure.

RB: They'll see me and come over and talk a little bit. Then one guy will kind of hang back, and he'll go, "That six hours, that's fine with me. That's all I can stand looking down that hole."

TW: Yeah, that's about right, yeah. I can understand that having done it. The fact is, the barber, he hit one in the head this year. He said he knocked into the bottom of the lake. He could see it laying there, but he didn't have a second spear.

RB: No.

TW: So, he pulled his other spear up. By the time he got it ready to go, it had already swum away.

RB: Oh, geez.

TW: So, I don't know whether that one died or not.

RB: They've got a pretty hard head.

TW: Yeah, I would think so, yeah.

RB: Yeah.

TW: I remember that they've got like bones on the outside. It's all pretty hard.

RB: That's how we validated the age. We took the otoliths out.

TW: Yeah.

RB: You can see the rings on the otolith, but we still didn't know if those were accurate either. So, we took otoliths from the largest fish we had in two years of the season. We dissected the core of the otolith out. We had it analyzed for carbon-14, which was put in the atmosphere by atomic bomb testing starting in 1958, when you were [inaudible].

TW: Yeah, right, yeah.

RB: There was a different amount each year until about 1970. So, if you could see how much carbon-14 was in the core, you could tell what year the fish was born.

TW: Yeah.

RB: That's how we validated the age.

TW: I see.

RB: That's how we found out that the (fin bones?) are underestimating the age.

TW: I'll be doggone. I didn't realize that.

RB: The otoliths are telling the truth, but they're really difficult to work with. [inaudible] worked with us when he was there.

TW: Yeah?

RB: But he just ground them on one side. The growth plane is complex in these things. So, if you grind them one side, you're not going to see – either side, you grind them, you're not going to see what's really happening inside. You have to section them.

TW: I'll be darn.

RB: So, we embed them in epoxy and section them.

TW: I see. There's a lot of work involved there.

RB: Yeah. Since we have the new license money, we put a lot into our lab to -

TW: I see.

RB: – to improve the techniques that we have to do all of this stuff.

- TW: Sounds like pretty good, yeah.
- RB: But, yeah, it's a great fishery to work with. I'm sure you have a lot to say [inaudible].

TW: Yeah, I had a lot of fun with it. Yeah.

RB: Were there any characters or any experience or characters that stick out your mind that you dealt with back then?

TW: Well, I'm trying to think of the name of the butcher over there in (Pipe?), village of Pipe.

RB: (Haymars?).

TW: Yeah, he was a Haymar. He was talking about using flying barbs on his spears. He was talking about those. [inaudible]

RB: We use a lot of those today.

TW: Yeah. He was a character, yeah. Then the guy worked for the department was (Lyle McCloud?). I don't if you've heard of him out there.

RB: I knew him, yeah.

TW: Yeah. Well, Lyle's in a nursing home right now, I understand.

RB: Really?

TW: Yeah, he's in bad shape.

RB: Is that right?

TW: He's not in good shape, yeah. He's going to [inaudible].

RB: He was retired when I first came to Oshkosh, but he was very upset that we stopped the sheepshead removal.

TW: Yeah, that's right. Yeah, that was something that – yeah. That sheepshead removal program was also boon to us biologists. Because we were able to use those nets for other stuff.

RB: Yeah.

TW: That was kind of a boon for us. Yeah.

RB: Well, we still do. You probably recall the (Calumet?).

TW: Oh, sure, yeah.

RB: We still have that boat.

TW: Yeah.

RB: We have a standardized assessment we've done for twenty-two years now with that boat.

TW: Is that right?

RB: We have standardized trawling transects, forty-nine transects on Lake Winnebago. We do

those three months out of the year. It's just fantastic data. It's nice long-term data system. We get all our information on year class strength of walleye, sauger, white bass, drum.

TW: We started out using the outboard motors. We used little 10-foot tri-nets.

RB: Yeah.

TW: We use those too, but –

RB: Out on Lake Winnebago?

TW: Yeah.

RB: Did you ever try to capture the sturgeon larvae on the river too?

TW: No, we never did. No.

RB: We've done it.

TW: Yeah.

RB: It's all-night work because they move at night.

TW: Well, I'm the guy that got trawling going on Winnebago. Because I went down to the Gulf of Mexico to figure out how to use trawls back - I don't know how many years ago that was. I wrote a report on it at that time.

RB: Was that when they brought the trawls on Winnebago to remove the sheepshead?

TW: Yeah, that's just about the same time.

RB: Yeah.

TW: I used trawls in those days. In fact, at that time, I even took trawls over to Mississippi River, and we were using trawls there at some of the pools of Mississippi River, just to show the guys how to collect fish with our boat. I used them on Poygan already too, by myself behind the boat [laughter].

RB: That was a pretty effective way to catch fish.

TW: Yeah, they work pretty good. Yeah.

RB: Like I say, we still do it to this day. It's a very important part of our community assessment.

TW: Yeah, I wouldn't be surprised. Yeah. That's a good way to go.

RB: Now ,we're even getting a lot of perch. There's so many perch in the lake now. We're even getting perch in our deep-water trawls.

TW: Yeah, that's pretty good, yeah.

RB: Whereas, typically, we didn't get too many before. Even bluegill, we're getting.

TW: Yeah, I understand that. Well, with the weeds growing out there, that's going to make a difference on perch and bluegills. I should go out there and do a little perch fishing one of these days.

RB: You should, yeah.

TW: Been pretty good.

RB: August to fall, it's just fantastic perch fishing.

TW: I'll be darn. Are there still any eel pots in the lake?

RB: Oh, yeah, there's a lot of [inaudible] in the lake.

TW: Yeah.

RB: They're spawning probably right now as a matter of fact.

TW: Yeah. They used to spawn in February. They're spawning out on [inaudible] reef. It's a really good place to fish in.

RB: Yeah. A friend of mine, a couple years ago, he had a shack out there right during the spearing season, as matter of fact. He was going on getting thirty, forty, fifty a day.

TW: I'll be darn. That's pretty good. Yeah.

RB: He could watch it. The water was so clear. He could watch him and just put it right down in front of their nose.

TW: Is that right?

RB: Yeah. Just like a little Swedish pimple or something.

TW: Yeah. I'll be darn.

RB: Yeah. But they're doggone good eating.

TW: Yeah. They're good, yeah.

RB: I'm sure you had a few in your day too.

TW: Huh?

RB: I'm sure you ate some in your day too.

TW: Yeah. I ate a lot of [inaudible]. They make good chowder. They really do a good job on that. They're good fried up too. They're good fried.

RB: I just made up 4 gallons or 3 gallons of Vern Hacker's Chowder weeks ago.

TW: That's pretty good. Yeah.

RB: For my school. We do all the registration log in like you guys used to.

TW: Yeah?

RB: We have since 1996. So, all the people that work the stations, they'd come down a day before the season. We have a meeting on the Silent Bay, on the fish camp, and we'll put a meal on for them.

TW: That's pretty good.

RB: I made chowder this year.

TW: That sounds good, yeah. [inaudible] right up.

RB: Yeah. I'm sure you knew Vernon too.

TW: Yeah, I knew Vernon very well. Yeah. I knew him very much. Vernon [inaudible] died – it's been a long time now since he died.

RB: Yeah.

TW: He had bladder cancer.

RB: Was that what it was?

TW: Yeah, that's what got him, yeah.

RB: I went to his funeral. I remember that.

TW: Yeah.

RB: But there was a lot of guys that passed through Oshkosh, it seems like. Because I find

names like (Pat Klein?).

TW: Sure, Pat Klein. Yeah.

RB: He was tagging fish with you.

TW: Yeah, I heard – I get a Christmas card from Pat. He lives in Wisconsin,.

RB: Yeah. He's another one I got on my list. I know I can find him. He's around someplace. I saw him a couple of years ago.

TW: Yeah.

RB: Paul Schulze worked there for a while.

TW: Schulze, yeah. In fact, I got a note from Schulze. He saw that picture that I had with a couple of geese in there [inaudible]. He sent me a little note on that. He said how he was really catching perch – a lot of perch on Winnebago.

RB: He's probably responsible for half the harvest I'd say.

TW: Yeah. He comes over from Plymouth. I always call him my - he's from Iowa originally. He was a great guy if you're going to Iowa. Well, he comes from a little town called Sac City, Iowa, which is considered the popcorn capital of the world.

RB: Really?

TW: Yeah. We used to just go over there and get 30- or 40-pound bag of popcorn and bring it back home. We live on that all winter.

RB: Oh, my gosh. So, these are the guys – they almost work for you, right, when they were training there?

TW: Well, they may have during the -

RB: The [19]50s there.

TW: They may have at that time, yeah.

RB: Because you were the lead biologist there.

TW: Yeah, I was the area biologist. So, they call them area biologists at that time.

RB: You had your office right at Oshkosh.

TW: Right. Yeah.

RB: In the Bayshore Building there, yeah.

TW: Yeah. Right.

RB: Well, that was built in [19]54, but you were there before [19]54, correct?

TW: Yeah.

RB: So, what was the office before that?

TW: Well, we were in that one of those wooden buildings that were right at the same spot is that brick building.

RB: Really?

TW: Yeah, that brick building, yeah.

RB: Is that right?

TW: Yeah. There was an old warden headquarters there. We were stationed up there on the second floor up there.

RB: Is that right?

TW: Yeah.

RB: Because the old barber in Oshkosh – oh, Jeepers. He had his – his name escapes me right now. He had this place across from Lourdes High School there, right on [inaudible]. I can't think of his name. But his dad was a boat maker.

TW: Yeah?

RB: His dad used to make boats for the old conservation department for the Rutgers group back in the [19]30s.

TW: Is that right?

RB: At that site. They had a shop. Well, a shop was back there. He used to make boats for that crew there.

TW: Yeah, they used to have a boat making shop there years ago. They had WPA guys working there.

RB: Yeah. His dad was the lead guy that [inaudible] this place.

TW: Is that right? I'll be darn. A lot of wardens got their little skiffs there because they made – cedar strip boats is what they made.

RB: Right.

TW: But then they also made 16-foot wooden boats that were pointed on both ends. The one end was a little spot, you could put [inaudible] motor on the back end of it. The fact is I used to use one of those on Poygan when I first went to work there. I remember he -

RB: Probably had a ten-horse and thought you really had something, huh?

TW: Yeah, we had ten-horse. That'd be too much, yeah.

RB: [laughter]

TW: Five-horses were awesome. I worked up at Sturgeon Bay. I had one of those boats that I used to set nets with, and I used a five-horse Mercury motor. When the five-horse Mercury motor came on those days, that was a beautiful little motor. Because you could spin that thing around.

RB: Sure, yeah. You could spin that around.

TW: With 360 degrees.

RB: The reverse was just spinning it backwards.

TW: Yeah, that's right. That's the way that thing worked, yeah.

RB: Yeah. Wow. At Sturgeon Bay? So, you worked out on Green Bay there?

TW: Yeah, I worked on Green Bay and Sturgeon Bay itself. I worked on smallmouth bass, mainly up there, yeah.

RB: Yeah. I recall reading something about that. I saw your name associated with [inaudible]. It does ring a bell now.

TW: Yeah.

RB: Yeah, in some paper or something, I saw a news article or something.

TW: In those days, we used to hook carp out in one of the local bays there, off of Sturgeon Bay.

RB: Really?

TW: In the wintertime, we'd do it through the ice and with a hook, with a little gaff hook and get those big carp.

RB: Smoke them up there.

TW: Smoke them up.

RB: Well, you've probably eaten some sturgeons also in your day.

TW: Sure, yeah.

RB: What's your favorite way?

TW: Smoking the sturgeon, that's the best way to eat sturgeon. It doesn't pay to fry them up. They aren't much good for that.

RB: Right. What about the caviar? Have you ever tried them?

TW: No, I never have. No.

RB: I should have brought you some.

TW: Yeah. I remember, I got a recipe in the file for making caviar using salt and that sort of thing. But I never monkeyed with it.

RB: Yeah. Well, we're doing a fecundity study right now, and we have – actually for the last four years. We've got forty-nine fish now that we've done fecundity on.

TW: Is that right?

RB: Yeah. So, we've got a really good idea of what the fecundity is and the range and all that. But some of the eggs are still usable. So, I have a couple of people in town that I trust won't sell it or do anything illegal with it, and I give it. I asked the spearer if they want it back. If they don't want it back, then I give it to them. The spearer just says, "Well, go ahead and give it to those people." But I've gotten a jar back. Man, it is just outstanding.

TW: Isn't that right? I'll be darn.

RB: It's really good.

TW: Just eat it on crackers?

RB: Yeah. I wish I would have brought you a jar, because I had two jars. I could have brought you.

TW: Geez, I've never had it. I've never eaten it. No.

RB: Just on crackers. I mean, I like it so much, I'll just get rid of the cracker and use a spoon.

TW: Is that right? I'll be darn. That tasty, huh?

RB: Yeah, it's good, very good.

TW: Taste like fish?

RB: It's a little fishy, but it's just got a really nice texture. It's real buttery.

TW: Yeah. I'll be doggone.

RB: It's very good. So, we're seeing some really big fish now in our population.

TW: I saw that in the paper – in this article, in this outdoor news article, yeah.

RB: Yeah. The last time we saw big fish like this was back when you were working.

TW: Yeah?

RB: I don't know if you have any recollection of what you thought was a big fish back then.

TW: Well, I remember I went up to look at the sturgeon that Elroy Schroeder had gotten.

RB: Yeah. You saw that fish?

TW: Yeah. That was 180 pounds.

RB: 180 pounds, 1953.

TW: Yeah. You know how that was weighed? That was weighed on a truck scale.

RB: Really?

TW: Yeah. That's how that was weighed.

RB: So, it may not have been real accurate.

TW: No, it couldn't have been too accurate. But it was close. It was a big, fat fish. It was a great big fish. There's no question about that.

RB: Well, I've got pictures. You probably took the pictures. It must have been one of his kids sitting on the back of that fish in his garage, ride it like a horse.

TW: Might have been, yeah. I don't know. It was a big -

RB: There were file photo from that.

TW: Is that right? That was a big fish, yeah. Yes, I remember Elroy Schroeder. I think he probably –

RB: Did you know him at all?

TW: I didn't know him at all. No. I just happened to go up there to get a - I think they've got a film going.

RB: Yeah, you guys [inaudible] seventy-three.

TW: Yeah. At the same time, got some pictures of it, yeah.

RB: Yeah, you must have taken those pictures.

TW: It might have been. I don't know. I think he had a pickup truck and then probably put on the back of his pickup truck. That's how they weighed it [laughter].

RB: Oh, my goodness. Wow, on a truck scale.

TW: Yeah, a truck scale. Going on the scale, so it's probably off a little bit.

RB: Yeah. We've got pictures of almost all of the top ten fish since 1941.

TW: Yeah?

RB: We've got photographs that we've been able to gather for this book. We'll probably have either a chapter or little insets of the story on each fish.

TW: I see.

RB: We'll add this to that story with Elroy Schroeder that was weighed on a truck scale.

TW: Sure. Yeah.

RB: In Appleton or some place.

TW: Yeah. He was from Appleton.

RB: Is that where the fish was weighed too, you think, in Appleton?

TW: Probably was, yeah.

RB: Because now, I mean, the bar for many years, in the time I've been there is relatively short time, over 20 years, it has been 100 pounds. People want 100-pound fish.

TW: Sure, yeah.

RB: In the last couple years, the bar has moved up to 150 pounds.

TW: That's pretty good, yeah. It's a pretty good size fish, yeah.

RB: So, we've captured some of the spring [inaudible] that are over 200 pounds now.

TW: I can't imagine that, yeah. Geez.

RB: They're over 7 feet long.

TW: Gee whiz. How do they get them on those little nets?

RB: This year, we had our first male over 100 pounds. We had 104-pound male.

TW: That's amazing. Yeah.

RB: Yeah. They're just huge. We thought we were just getting older, and we couldn't handle it anymore. But they are getting bigger. [laughter] I talked talk to Dan. He said, "I think we're just getting older, Ron. We can't handle them like we used to."

TW: Yeah. Well, probably -

RB: We got a wider range of ages in the stock now.

TW: I see. Yeah.

RB: We've got more older fish in the stock than we had.

TW: I'll be darn. That's interesting.

RB: Well, I think that's all the questions I have. I read through these again before coming here today, through your papers, one on the upper lakes, and then the one that you did on Winnebago. For only having maybe ten years or fifteen years of data on such a long-lived fish, you nailed it right on the head.

TW: Good. Yeah.

RB: Given that you don't have the technology back in the day of sawing the spines with a jeweler's saw, all that stuff.

TW: All hands-on, yeah.

RB: Yeah. Your population estimates, I've re-figured them using the same data with different new models that they've come up with since then, models that they actually developed back in

the [19]60s and [19]70s.

TW: Yeah.

RB: Even some that had been developed in the [19]80s, the real, fancy population models. They come right up to the same as what you guys have.

TW: I see. Yeah.

RB: So, the work you guys did is basically validating the stuff we're doing now.

TW: Good. Yeah.

RB: So, you definitely were a pioneer, Tom.

TW: Good.

RB: I have to personally thank you.

TW: Yeah. I'm glad to do it [laughter].

RB: Because what we're learning today wouldn't be possible without your early work.

TW: So, you happen to know Bobby Harris?

RB: Yeah, I knew Bob. I knew Dick well too.

TW: Yeah.

RB: I know Bob, sure.

TW: Yeah. He's still living on the lake, I assume.

RB: I think he's still there. His dad's place is there.

TW: Yeah.

RB: Yeah, Point Comfort. He runs an investment company. Well, he has his own investment services or something.

TW: Yeah, it seemed to me that he was working on that. Because after I had retired, I had talked to him a couple of times. I got him to invest some money for me.

RB: Yes, good guy.

TW: Yeah.

RB: One of the reasons we're doing this book is that a lot of the people that lived through that era, they're either passed away or moved away. We're trying to capture, so it's not lost.

TW: Good idea. Yeah.

RB: But I'll make sure you get a copy when we get it done.

TW: Good. I'd like to see it. Yeah.

RB: I'll bring you one, Tom.

TW: Okay. Good idea. I'd appreciate that. So, do you want a cup of coffee or tea or something?

RB: Tea would be great.

TW: Yeah. I'm a big tea drinker myself.

[end of transcript]