

The Tributary

A Newsletter of the Western Division, American Fisheries Society

Volume 22, No. 1 February 1997

PRESIDENT'S CORNER

Tom Nesler

Of Natives and Nonnatives

Fishery management is a human enterprise, and therefore susceptible to the changing, and often conflicting values of human society. With few exceptions, I have observed most fish biologists to be human, and therefore also subject to changing and conflicting values; both within themselves and from the public whose aquatic resources they "manage". Most aquatic resource professionals I know approach their profession from the philosophical basis they were exposed to during their academic training. Historically, college training prepared us for careers in some field of fishery science. We were prepared for either managing, studying, or growing fish as part of a fishery. Catch rates, harvest and angler use were important criteria. This mental framework, which is not presented here as good or bad, is a highly influential part of the philosophical core of our Society.

There are two additional forces at work that influence fisheries managers in the western United States, and particularly in the Rocky Mountain states. First, evolution did not provide an abundance of native fish species found desirable by white settlers. Only six of 57 fish species in Colorado are considered game species, and only two, the cutthroat trout and channel catfish, offer real sportfishery potential by present angler values. Secondly, human use of water supplies and modifications to aquatic and land

resources in the arid West have left the manager with habitats and ecological conditions such as fluctuating reservoirs, ephemeral streams, and degraded water quality under which native species did not survive or compete well. These forces indirectly led to the introduction and use of a multitude of nonnative fish species considered to be desirable as gamefish.

Are native species always more important than nonnative species? While there are people who can unequivocally say yes or no, the realistic answer probably lies somewhere in between and is of multiple choice format. One answer that seems to be responsive to the middle ground is that which states that native species are recognized as having an irreplaceable value, and use of nonnative species in modified environments to provide fishing recreation is necessary and desirable, but exercise of the latter option should never jeopardize the continued existence and well-being of the native species. This is a "bottom-line" compromise approach to fish management that is certainly understandable, but not without problems in its interpretation or implementation.

Most participants in the controversy over native versus nonnative fail to acknowledge the role of humans as both an evolutionary and ecological force. This is further

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1996-1997 WESTERN DIVISION AMERICAN FISHERIES SOCIETY COMMITTEE CHAIRPEOPLE AND OFFICERS

Division Officers

President - Tom Nesler (970) 484-2836, ext. 357, 490-6066/tom.nesler@state.co.us
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Past President - Dennis Lee (916) 654-1369/653-8256/104472.612@compuserve.com

Internal Committees

Archivist - Venice Beske (307) 777-7982/6289
Audit - Lou Carufel (907) 452-6709/455-6709
Awards - Dennis Lee (916) 654-1369/653-8256
Equal Opportunity - OPEN
Membership - Bob Bilby (206) 924-6557/6970
Newsletter - Greg Kindschi (406) 587-9265 ext. 124/586-5942
Nominations - Dennis Lee (916) 654-1369/653-8256
Policy Review - Dennis Tol (907) 271-3348/5479
AFS and WDAFS Annual Meeting - Monterey, CA
Arrangements - Ken Hashagen (916) 327-0712/

324-0475 and Dennis Lee (916) 654-1369/653-8256

Program - Pete Bisson (360) 753-7671/956-2346 and Jennifer Nielsen (408) 655-6233

Point-Counterpoint Session and Abstract Review - Leo Lentsch/Tom Nesler - Native Trout Management Session

External Committees

AFS Resolutions - Dennis Tol (907) 271-3348
AFS Certification Appeals - Frank Pfeifer (970) 245-9319/9366

Bull Trout Conservation - Karen Pratt (208) 389-9938/224-1892

T/E Fish Species - Leo Lentsch (801) 538-4756/4745

Environmental Concerns - Michael Ward (360) 665-3084/3081

Habitat Inventory Procedures - Mike Young (307) 742-6621/0397

Native People's Fisheries - Kelly Meyer (520) 338-4385/1712

Riparian - Jim Silvey (208) 384-3157/3083

National Nominating Committee Representative - Bob White (406) 994-3491/3190

SOCIETY NEWS

1997 WESTERN DIVISION GRADUATE

STUDENT SCHOLARSHIP

The Western Division is pleased to announce its third, graduate-level student scholarship(s). Applications are now being solicited. This scholarship was approved at the 1994 Western Division Meeting along with an annual obligation of up to \$3,000. The Award Committee will again consist of Carl Burger, Rich Carmichael, Gene Maughan, Christine Moffitt, and Carl Schreck. The Award's application criteria are presented below. Please make them available to any graduate students that you feel may qualify. The 1997 scholarship(s) will be awarded at the Western Division Annual Meeting in Monterey, CA next August, when the Western Division meets jointly with the Parent Society. The annual dollar amount will not exceed \$3,000 in total and the Committee may choose to divide this sum among closely ranked applicants.

APPLICATION CRITERIA

1. The deadline for receiving applications is March 15, 1997.
 2. Applicant must be a member of AFS or must have submitted AFS membership materials at the time of application.
 3. Applicant must have completed successfully two quarters or one semester in residence in a current graduate degree program at an accredited institution of higher learning within the Western Division.
 4. Applicant's major field of study must be related to fishery or aquatic resource science.
 5. The application package must contain a letter to the Award Chair that specifies:
 - a. the applicant's career goals and reasons for applying (up to 200 words);
 - b. the relevancy of his/her work to the objectives of AFS (up to 200 words);
 - c. the anticipated degree and completion date of graduate study; and
 - d. the names and addresses of two faculty members (one must be the graduate student's advisor) familiar with the student's background and abilities. (The Award Chair will send a standardized recommendation form to each of these two references.)
 6. The application package must also include copies of undergraduate and graduate transcripts, and a one-page abstract that outlines such items as the goals, objectives, design, methods, and expected products from his/her graduate work.
- An original application package and four photocopies of the package must be sent (postmark on or before March 15) to:
- Carl Burger, Chair
Western Division Scholarship Award Committee
Abernathy Salmon Culture Technology Center
1440 Abernathy Road
Longview, WA 98632
360-425-6072

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The Tributary is distributed to 3,367 WDAFS members and exists as a forum to present fisheries-related information. The editor is Greg Kindschi. If you have information you would like included in The Tributary please send, call or FAX it to:

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Submissions for the next issue of The Tributary are due by April 30, 1997

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Nominations Sought for Meritorious Service Award

The Meritorious Service Award is awarded to an individual AFS member for unswerving loyalty, dedication, and meritorious service to the Society over a long period of time; and for exceptional commitment to the programs, ideals, objectives, and long-term goals of AFS. The closing date for nominations is June 15, 1997 and forms are available from Carolyn A. Griswold, Northeast Fisheries Science Center, Narragansett Lab, 28 Tarzwell Drive, Narragansett, RI 02882-1199, phone: 401-782-3273, FAX: 401-782-3201, E-mail: carolyn.griswold@noaa.gov

1996 Western Division Annual Meeting

Chapter and Committee Reports
by Dennis Lee, Past President

Alaska: Past President Carl Burger attended the Alaska Chapter Annual Meeting in Wasilla, AK, on November 13-16, 1995 (Goal A).

Arizona/New Mexico: The Arizona/New Mexico Chapter held their Annual Meeting February 1-3, 1996 in Sierra Vista, AZ, in conjunction with the The Wildlife Society. The theme for the meeting was "Use of Public Land and Resources - Where Do Fish and Wildlife Fit?" (Goal A)? A continuing education workshop on "Fish Health" was offered in conjunction with the Annual Meeting.

Bonneville: The Bonneville Chapter held their 1996 Winter Meeting on February 28-March 1, 1996 at Utah State University, Logan, UT in conjunction with The Wildlife Society. The theme was "A Century of Utah Fish and Wildlife Management - Insights to the Future (Goal A and Goal C.2).

California/Nevada: Chapter President Ed Bianchi reported the Chapter held a successful Annual Meeting on February 28-30, 1996, in Ventura, CA (Goal A). The General Session targeted "Southern California Freshwater Systems" and a one-day Symposium entitled "Status and Management of Southern Steelhead" preceded the meeting (Goal A.2.a). Special Contribution Awards were presented to Dr. Jennifer Nielson, Steve Parmenter, Marty Brittan, and Robert Reavis. Roger Wolcott received the Chapter Distinguished Professional Achievement Award.

The Chapter's Conservation Committee has remained active in fishery related issues including the North Fork of the American River Auburn Dam proposal, and various State Assembly and Senate bills that affect fisheries resources (Goal C.1.a).

Chapter members are actively planning the 127th Annual Meeting of AFS scheduled for Monterey, CA from August 24-27, 1996. Jennifer Nielson is Program Chair, Ken Hashagen is Local Arrangements Chair, and Dan Odenweller is the contact for Trade Show information. Several planning meetings have already been held and committee members selected. The Annual Meeting will be held at the Monterey Convention Center with the Doubletree and Marriott Hotels acting as accommodation hosts.

Colorado/Wyoming: The Colorado/Wyoming Chapter held three Executive Meetings this past year and their 31st Annual Meeting was held March 19-21, 1996, in Ft. Collins, CO. The theme was "Back to Basics; Cleaning the Chapter House" and focused on up-dating organizational structure and clarifying roles. Several financial aid efforts were undertaken including a \$500 donation to AFS 2000. This year's meeting included a one-day continuing education workshop entitled, "Conservation Biology for Fisheries Workers" that was chaired by Dr. Wayne Hubert (Goal A.2.a). The Chapter has been active in a variety of conservation roles and President Gordon Sloane continued to keep members updated through the Chapter's newsletter, *The Angler* (Goal C.1.a).

The Yellowstone cutthroat trout management plan was completed by Bruce May and published in the chapter newsletter. The Chapter reviewed the WY Game and Fish Department's Piscivorous Bird Management Plan and provided comments.

The Chapter sponsored National Fishing Week events in both states, and selected an official logo for the Chapter created by Chuck Wheller of Laramie. The logo will appear on Chapter stationary and the newsletter.

Hawaii: The Hawaii Chapter held quarterly meetings this past year that included guest speakers. Chapter President Ken Leber reported that the Chapter has actively followed several State Bills affecting Hawaiian

fisheries and is developing a sequential strategy for submitting bills with respect to ballast water introductions and tracking important issues. President Ken Leber reported that there are several issues the Chapter will be reviewing including recreational fishing licenses, seminar sponsorship, increase of Chapter revenues, and funding for the State Fishery Agency.

Humboldt: The Environmental Concerns Committee of the Humboldt Chapter gave notice to the CA North Coast Regional Water Quality Control Board that fisheries scientists were concerned about lack of protection for salmon and steelhead resources in northwestern CA streams from impacts related to logging. The letter, signed by AFS President Roger Barnhart, cited pervasive problems related to sediment and temperature in logged watersheds and the critically low levels of some anadromous salmonid species, particularly coho salmon. The lack of certification of Best Management Practices for CA Forest Practice Rules under the Clean Water Act points out the serious failures of the latter legislation to meet its goals in abating non-point source pollution.

The Chapter received a disappointing reply from NCRWQCB Executive Director Ben Korr saying that regulatory mechanisms were functioning well. He pointed out that the Chapter had ample opportunity for input on timber harvest plans and other processes. In fact the Chapter's comments to the Board of Forestry on four different issues have never been acknowledged and have led to no constructive changes to better protect aquatic resources. The Chapter may join with other groups in requesting the decertification of the CA Department of Forestry and the State Water Resources Control Board for enforcement of non-point source pollution control under the Clean Water Act.

The Chapter has also been very active in trying to modify CA Department of Fish and Game hatchery system practices in the Klamath/Trinity Basin. While suggesting short term solutions to over-escapement at Iron Gate and Trinity River hatcheries, a long term solution is needed. The Chapter intends to build support for universal marking of Pacific salmon species so that selective harvest can be implemented in order to allow wild stock recovery and continuing access for fishing. The Chapter also will work with CA Fish and Game to improve steelhead performance at both hatcheries as neither is meeting mitigation goals.

The Humboldt Chapter continued to host a monthly meeting (Goal A). Jud Ellinwood was presented the Chapter's Fish Habitat Restoration Award, the Chapter's Education Award went to Americorp's Watershed Stewards Project, Tom Lisle was presented the Chapter's Contribution to Fisheries Science Award, and Margo Williams received the Chapter's Service Award.

Idaho: The Idaho Chapter held their Annual Meeting February 29-March 2, 1996 in Coeur d'Alene, ID (Goal A).

Montana: The MT Chapter held their Annual Meeting February 13-16, 1996 in Kalispell, MT (Goal A).

North Pacific International: Chapter President-Elect Bryan Hebden reported that the results of the AFS-NPIC salmonid stock status project were successfully used as background for discussions with the Minister of Fisheries and Oceans in Canada to discuss stock depletion.

The Stock Status of British Columbia and Yukon Salmonids Project Report was completed and submitted to the Parent Society for review.

The North Pacific International Chapter and the Sustainable Fisheries Foundation hosted in partnership the International Sustainable Fisheries Strategy Conference in Victoria, British Columbia, from April 26-30, 1996 (Goal A.2.a and Goal C.1.c). The purpose of the conference was to exchange information on the current status of fisheries resources, the institutional and legal constraints on fisheries management, and the opportunity for restoring salmonid productivity and use to levels that assure availability of the resource (Goal C.1.a). The Chapter also held their Annual Meeting in connection with this conference.

Oregon: This past year the OR Chapter passed resolutions on the Introduction of Aquatic Species in OR Waters, Human Population Growth, and Resource Consumption.

The OR Chapter hosted their Annual Meeting at Sunriver, OR on February 21-23, 1996. The theme for the meeting was "Restoration of Aquatic Ecosystems," with an emphasis on practical applications (Goal A.2.a). The Chapter also hosted the 1996 WDAFS Annual Meeting, a Searun Cutthroat Trout Symposium, and a special session on career options in fisheries (Goal C.4.b.2). The Chapter published the proceedings of the Chinook-Coho Workshop and the Rangeland Sympo-

sum held this past year.

The Chapter sponsored a workshop on identification of freshwater sculpins of OR and adjacent areas and plans to develop a guide as a result of the workshop, is editing a Searun Cutthroat Trout Symposium proceedings for publication; and provided comments on a technical paper based on four years of work by the Watershed Classification Committee of the OR Chapter that was published in AFS Symposium No. 17. Chapter members assisted with the development and review of the Upper Klamath Basin Bull Trout Conservation Strategy: A Conceptual Framework for Recovery, a handbook for prioritizing watershed protection and restoration to aid in the recovery of native salmon.

The Information and Education Committee of the Chapter continues to distribute Stream Continuum Posters to educators.

The Chapter granted scholarships to graduate and undergraduate students and in the future will pay for a year of AFS membership to help recruit new Society members. Other grants included \$1,800 for sponsorship of the Salmon Watch Program; \$500 to the Fremont National Forest for an educational poster; waived registration fees for Russian fishery scientists attending the WDAFS meeting and workshops; \$150 for development and travel for the Diversity Workshop; and \$500 to the Nature Conservancy for polling OR citizens.

The Oregon Chapter Executive Committee met several times to develop work plans and discuss ongoing issues. The Chapter continues to be very active reviewing and providing comments on OR fishery related issues (Goal C.1.a).

Portland: The Portland Chapter held their Second Annual Meeting on May 30, 1996 in Troutdale, OR (Goal A). The meeting featured speakers on various local fisheries topics (Goal C.1). The chapter is in the process of revising it's bylaws and hopes to have a revised draft available for the Annual Meeting. The Chapter hosted the 10th Annual Stream Habitat Improvement Workshop on August 19-22, 1996, at the LeSells Stewart Center on the campus of OR State University in Corvallis, OR (Goal A.2.a). The objective of the workshop was to present the state of art on how to "worry intelligently about stream habitat improvement."

Highlights of Committee Reports

Bull Trout: This committee reviewed MT's proposed strategy for bull trout restoration efforts at the request of the State of MT (Goal C.1.a).

Bylaws and Resolutions: Efforts were successfully directed at revising the WDAFS Bylaws.

Environmental Concerns: In concert with the Native Salmon Stocks Committee, the Environmental Concerns Committee is tracking current and upcoming fishery legislation and developing a system to electronically link the WDAFS chapters and committees for the exchange of fish data and information (Goal C.2). The committee continues to review WDAFS water quality position statements (Goal D.1.d).

Historian: Chair Venice Beske continues to locate and review important WDAFS materials suitable for archiving. The committee goals are to have an institutional history available for the WDAFS's 50th Anniversary in 1998.

National Nominating Committee Representative: Ginger Thomas, a member of the MT Chapter completed her responsibilities as charged.

Native People's Fisheries: For the second year, this committee awarded an annual travel grant for Native American/First Nation undergraduate students within the WDAFS (Goal E.3.a. And Goal G.2.e). The committee offers a grant of up to \$500 for one or more students to attend the WDAFS Annual Meeting to encourage participation. The application procedure includes an essay on career goals and why they want to attend the Annual Meeting.

Native Salmon Stocks: Committee efforts have been directed to locally important issues and has worked in concert with the Environmental Concerns Committee. In the future, this committee's activities will be included as part of the Environmental Concerns Committee.

Nominations: Nominations for the offices of Vice-President and National Nominating Committee Representative were solicited and resulted in the election of Bob Bilby as Vice-President and Bob White as Nominating Committee Representative (Goal E).

Old Growth Forests: This committee reviewed the draft EIS on the CA Spotted Owl Management Plan and is tracking new legislation and information on the "Headwaters Forest," an area in Northwestern CA that provides old growth redwoods and important coho salmon

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habitat (Goal C.1). In the future, this AD Hoc committee will be included as part of the Environmental Concerns Committee.

Riparian: The WDAFS Riparian Challenge Awards were made again this year at the Annual Meeting.

Other News Items

AFS undergoes Organizational Audit

The Society, and particularly the Bethesda office, was the focus of a self-initiated organizational audit through a private firm. The audit specifically targeted fiscal management, membership, a performance management system, Board Governance-Policy and Procedure, volunteer management structure, and publications. Results should be available to AFS soon.

The Trouble with being Big...

...is that we have a lot of delinquent members (495 in 1996) compared to the other subunits. Bob Carline has requested that we contact delinquent members and urge them to renew their membership. Recruiting new members is like building sand castles if your base is eroding at a faster rate. Chapters should attempt to comply with Carline's request. The success rate of this effort and the reasons offered for not renewing should be very instructive to a membership recruitment and services strategy.

AFS Resource Policy Statement - Human Use of Fish and Other Living Aquatic Resources

A special task force, including WDAFS President Tom Nesler and Cal-Neva President Dennis McEwan, has been assigned under the lead of Lee Redmond to redraft a policy statement on the above, obtain membership comment, and present a revised draft to the Governing Board at its March 1997 meeting. Any WDAFS member or subunit that would like to receive copies of the 1996 draft that was tabled in Dearborn, please let Nesler or McEwan know. A primary criticism of this draft was the lack of a scientific basis for the positions. Chapter Presidents and individual members are urged to provide input. We will let you know when and how comment should be received on the 1997 draft revision.

1872 Mining Law Reform

Western Division and Colorado-Wyoming Chapter member Steve Wolf has been designated as issue steward to assist AFS and Paul Brouha in developing the scientific basis for positions, testimony, and information packets concerning potential reform of this important law. Helping Steve will be Kelly Hepler from the Alaska Chapter, Karen Hamilton from the Colorado-Wyoming Chapter, and Bret Harvey from the Humboldt Chapter. The WDAFS Excom greatly appreciates the initiative and volunteer efforts of these four persons, and encourages the other WDAFS Chapters to designate information contact persons to assist this task group.

First Call For Papers, Catfish 2000, the First International Ictalurid Symposium

The Program Committee for the First International Ictalurid Symposium invites contributed papers for this conference scheduled for June 23-28, 1998 in Davenport, Iowa (Quad Cities area of Illinois-Iowa). Sessions will cover biology and management of channel, flathead, blue, and white catfish, as well as smaller members of the family. We especially solicit presentations that focus on: population dynamics including age-growth, recruitment, reproduction, and mortality; assessments of stockings of public waters; genetic relationships among catfishes; catfish behavior and sensory capabilities; movement and migration studies; population characteristics in large rivers, streams, lakes, and reservoirs; human dimensions including socioeconomic analyses, angler attitudes, competitive fishing, and edibility and consumption advisories; sampling techniques; effects of rod-and-reel angling, non-angling techniques of fishing like "noodling," and non-rod-and-reel methods including limblines, trotlines, and jug fishing; commercial fisheries; habitat requirements; effects of habitat alteration on populations; and harvest management through regulations. The Committee will consider all submissions, however.

The Committee recognizes that some studies may not yet be completed but abstracts should be as definitive as possible. Papers may report results of recent investigations or cover topics from a historical perspective, or review a topic (review papers). In all cases, authors should relate their results to the broader literature.

Please submit abstracts ranging in length from 150 to 350 words that may be typed or sent electronically via FAX, modem, or email. Send enquiries and submissions

to Steve Eder, MO Dept. Of Conversation by February 1, 1997 or soon thereafter. Hard Copy: P.O. Box 180, Jefferson City, MO 65109-0180. E-mail: eders@mail.conversation.state.mo.us. FAX: 573-526-4047.

Acceptance of abstracts will be based on review by the Program Committee and outside reviewers. Once abstracts are accepted, first-draft manuscripts will be due by January 15, 1998. Manuscripts will be peer reviewed by experts in the field. Papers accepted and presented will be published in a hard-cover proceedings that will serve as a major reference for catfish researchers into the 21st century.

Publications Announcement

Fishing Vessel Insurance-How Much Is Enough?

The reasons for carrying vessel insurance are clear, but what should your policy cover? This article answers many questions operators need to know about marine policies. The article covers the four types of vessel insurance: hull and machinery, breach of warranty, cargo, and protection and indemnity. Learn how much insurance you need, whether to incorporate to avoid liability, how legal defense costs are covered, and more. Terms such as maintenance and cure, negligence, unseaworthiness, and self-insurance are fully explained. Author Terry Johnson is a fisherman and associate professor at the University of Alaska-Fairbanks. There is no charge for this 8 page publication. To order contact: Alaska Sea Grant College Program, University of Alaska-Fairbanks, P.O. Box 755040, Fairbanks, AK 99775-5040. Phone: 907-474-6707, FAX: 907-474-6285, E-mail: FYPPUS@aurora.alaska.edu.

The Northwest Salmon Crisis. This remarkable and timely book shows that the history of the Northwest salmon crisis is long and disturbingly consistent, with concern over declining salmon runs beginning in the 1880s. This book explores the cultural forces that have, in just 150 years-nearly brought to extinction salmon that have run in the Columbia River Basin for thousands of years. For this first documentary history of the salmon crisis, knowledgeable observers of salmon history have chosen and commented upon the documents that they feel most clearly reveal the causes and early warning signs of today's crisis. The eighty documents collected

here address such issues as habitat, hatcheries, hydro-power, fisheries, Indian fishing rights, and watershed management. Historic photographs and other images complement the text. Editors are Joseph Cone assistant director for communications of OR Sea Grant and Sandy Ridlington managing editor of OR Sea Grant. Price is \$29.95 for this 384 page publication. To order contact: OR State University Press, Dept. S-1, 101 Waldo Hall, Corvallis, OR 97331-6407. Phone: 541-737-3166, FAX: 541-737-3170.

High Latitude Crabs: Biology, Management, and Economics.

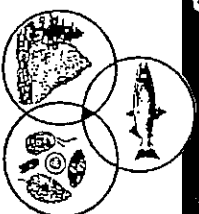
In the Bering Sea and elsewhere in the world crab fisheries have not been sustained over the long term, begging a critical evaluation of our understanding of crab biology, ecosystem dynamics, and management. This proceedings builds on knowledge brought together during four previous north latitude crab symposia, and presents recommendations for future crab research. Forty-eight papers are included, on research from Argentina, Australia, Canada, Japan, Norway, Russia, and U.S. By continuing to build on the crab data through the Lowell Wakefield Symposium Series, sponsors hope to better conserve the resource, strengthen the industry, and provide accessible healthful protein to the consumer. This proceedings is from the International Symposium on Biology, Management, and Economics of Crabs from High Latitude Habitats, held in Anchorage, AK in October, 1995. Price is \$50 for this 720 page publication. To order contact: Alaska Sea Grant College Program, University of Alaska-Fairbanks, P.O. Box 755040, Fairbanks, AK 99775-5040. Phone: 907-474-6707, FAX: 907-474-6285, E-mail: FYPPUS@aurora.alaska.edu.

The Ichthyogram. This is a quarterly publication of the Fisheries Experimental Station, UT Division of Wildlife Resources in Logan that is an excellent source of information on UT fisheries.

In their seventh year, recent articles have included, "Whirling Disease Prevention and Control: A Review," "Rearing Density and Cutthroat Trout," "Evaluation of Low Phosphorus Feeds," and "Tripliod Trout Production by Electroporation." If you would like to be included on the mailing list, send your name and address to: EDITOR, The Ichthyogram, 1465 West 200 North, Logan, UT 84321.

SYMPOSIUM ANNOUNCEMENT

Pathogens and Diseases of Fish in Aquatic Ecosystems: Implications in Fisheries Management



**June 3-4, 1997
Sheraton Airport Hotel
Portland, Oregon**

Mark your calendar now for this important symposium organized by the Pacific Northwest Fish Health Protection Committee

Symposium Objectives

- To foster information exchange and dialog about the interactions of fish and fish pathogens in aquatic ecosystems, with emphasis on:
 - Distribution of selected pathogens and a discussion of their potential impacts on populations of fish in aquatic ecosystems
 - Factors affecting pathogen transmission between wild and cultured populations of fish and the associated risks
 - Management strategies to minimize and avoid pathogen impacts of fish on aquatic ecosystems
 - Areas needing additional research emphasis

Target Audience

Anyone with an interest in aquatic resource management including fish and aquatic resource managers, sport angling groups, conservation organizations, researchers, fish health managers and the general public.

For More Information, Contact:
Ray Brunson, Executive Secretary
Pacific Northwest Fish Health Protection Committee
3704 Griffin Lane SE, Suite 101
Olympia, WA 98501
Phone (360) 753-9046 FAX (360) 753-9403

SYMPOSIUM ANNOUNCEMENTS

Nesler

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complicated by one's perception of humans as either part of, or separate from, the ecosystem and natural order of things. For example, do you consider the dispersal of European white settlers across the Atlantic Ocean and across North America and the displacement of the existing native peoples a natural process? If not, why not? When in our evolution from prehistoric hominids to the cosmopolitan species of the present did our actions become unnatural and artificial? Clearly, humankind's presence on today's Earth is having direct and indirect effects on every ecosystem that may be considered, from the neighborhood creek, to the Great Lakes, to the world's oceans. How should we manage for native species when most environments have been modified to some degree by our actions past and present? More importantly, can we even manage ourselves to avoid the textbook ecological lessons of populations that exceed their habitat and resource limits?

Over the past two decades that comprise my professional half-life, human impacts to our environment and human awareness of undesirable trends in the quality of our environment have led to an ever-increasing emphasis on the preservation or conservation of natural aquatic environments, species, and ecosystems. The Endangered Species Act of 1973 became the major legal catalyst for action and the spearhead for both the preservation and conservation movements. It has also led to labels and "sides" within natural resource professions formerly dominated by the traditional hunting-fishing imperative. AFS is no exception.

Wild Trout VI "Putting the Native Back in Wild Trout" Montana State University, Bozeman Strand Union Building August 17-20, 1997

Sponsored by: Trout and Salmon Foundation, Federation of Fly Fishers, Trout Unlimited, U.S. Fish and Wildlife Service, U.S. Forest Service, National Park Service, Montana Fish, Wildlife and Parks, American Fisheries Society, Montana Chapter AFS

Purpose and Goals of the Symposium

The Wild Trout Symposium were established as a forum for working professionals and fishery conservationists from across North America to improve awareness of current research and critical issues facing wild trout resources. The objectives of Wild Trout VI are to raise the public awareness of native wild trout, their social and economic value, examine the future of wild trout in a society with increases in urbanization and decreases in funds, and evaluate strategies for restoration and protection of these fish.

Since 1974 an international symposium has been convened every 5 years in Yellowstone National Park to focus on the ecology and management of wild trout. The symposia have evolved over the years to encompass a broader view of wild trout and their habitat. Concerns for wild trout have increased the need to improve communications among managers, scientists, and anglers. The record attendance at Wild Trout V indicates the interest in wild trout remains high and is increasing. To cope with rapid developments and increasing demand for information the cycle has been shortened to 3 years.

Wild Trout VI is being hosted by Montana State University in Bozeman, Montana because we have outgrown facilities at the Park. Rest assured that we will not abandon the spirit of the earlier gatherings and we will continue the traditions of the previous Wild Trout Symposia.

Montana State University has excellent facilities to make our stay enjoyable. The waters of Yellowstone National Park are about an hour away and Bozeman is near many of Montana's Blue Ribbon Trout streams.

Symposium Features Plenary Sessions

Plenary Sessions will feature well known speakers on a variety of topics of interest to wild trout enthusiasts and professionals.

Field Trips

A field trip will be available on Wednesday afternoon, August 20, 1997. We will tour the Federation of Fly Fishers Museum in Livingston, Montana. There is an extensive collection of flies as well as antique and modern fly fishing equipment and also habitat and conservation displays.

Other Features

The symposia will also include a trade show, BBQ, Banquet Awards Luncheon and more.

As I changed job duties in 1985 from sport fishery/researcher to endangered fish researcher, my focus changed from fishery to fish, from introduced to native species, from respected to suspected. The change forced me to inspect the boundaries of my environmental ethics and values. The public, when confronted with an environmental issue concerning choices of native versus nonnative species, looks to the professional biologist for guidance, support or clarification. Few of us are knowledgeable enough to translate our scientific knowledge about ecosystem function to the lay person in a manner that allows anyone to make a well-informed decision. Will AFS be in a position to provide a solution when our professional ranks are divided by the very biases that create the problem?

Assuming each of us in AFS can call upon the sense of objectivity that distinguishes us as practitioners of the scientific method, there is a vital role our Society must play in redefining our mission. Conservation and wise use of natural aquatic ecosystems is an expanding and significant "new" branch of fisheries science whose target will often not include catch rates, harvests and angler days. I have suggested to colleagues that there are fishery biologists and fish biologists and their job descriptions are different, but both are serving in the public trust. It is the perception of what resources are being held in the public trust that has changed. It is interesting to observe the degree of AFS attention that listing and recovery of Pacific salmon has garnered in the past five years, and contrast that with the interest directed by AFS toward the white salmon of the Colorado River, which has been an endangered species

since 1973. This latter species also migrates long distances along rivers to spawn, is a top predator within its fish community, grows to a large size and takes an angler's lure readily. The Colorado River white salmon is better known as the Colorado squawfish. So much goes with a name! Its brethren species in the rivers of the Northwest, the northern squawfish, is reviled as a predator and part of the problem of declining salmon smolt migrations even though it too is a native. A bounty is paid for its demise. What of the lamprey, sucker, minnow, sculpin, and sturgeon species that share salmon habitat? How did they fare prior to the salmon concern, and are they perhaps worse off than the razorback sucker and waindfin because they have to compete for attention with celebrities like chinook and coho salmon?

So what are we going to do? AFS is faced with the same complexity of decisions that every individual fishery manager faces. We have just adopted a position statement that emphasizes biodiversity and recognizes the importance of all native species in the function of ecosystems. Will we follow through and embrace this philosophy in a manner equal to our regard for sportfishing recreation? On the other hand we continue to struggle with an appropriate Society position on the human use of living aquatic organisms, even though a long-term, primary objective of AFS is the wise use of fisheries. Can AFS be a leader in both the wise use of fisheries and the conservation of fishes? What we choose to do as subunits and as a Society in the next 5-10 years will determine if we are leaders of one, or both, or neither.

Schedule of Events
Sunday, August 17
6:00 PM to 9:00 PM: Registration at Strand Union, MSU. Refreshments will be sponsored by Trout Unlimited and the Federation of Fly Fishers.

Monday, August 18
7:30 AM to 2:00 PM Registration
8:00 AM to 10:00 AM Opening Remarks
10:00 AM to 5:00 Sessions and Luncheon
6:00 to 9:00 PM Banquet

Tuesday, August 19
7:30 AM to 2:00 PM Registration
8:00 AM to 5:00 PM Sessions and Luncheon
6:00 to 9:00 PM Western Barbeque

Registration Form
Wild Trout VI
August 17-22, 1997
This information will be used to create your name tag.

Name _____
Affiliation _____
Business Address _____
City _____ State _____
Zip _____ Country _____
Day Phone () _____ Fax # () _____
Guest Name(s) _____
E-Mail Address _____
Please check appropriate spaces, enter all costs, and total.
Registration Fees: Before After
Registration May 30 May 30
Extra BBQ Tickets \$125 \$150
Extra Banquet Tickets X (\$15)
Extra Luncheon Tickets, Mon. X (\$20)
Extra Luncheon Tickets, Tues. X (\$8)
Total Registration Fee _____
Check to Montana State University-Bozeman enclosed.
Institutional Purchase Order enclosed.
Credit Card Type _____
_____ Expiration Date _____
Signature _____

Wednesday, August 20
8:00 AM to 12:00 PM Sessions and Luncheon
1:00 PM to 4:00 PM Fly Fishers Museum tour
Registration includes luncheons on Monday and Tuesday, banquet Tuesday evening, BBQ Wednesday evening, and morning and afternoon breaks each day. All checks are to be made in U.S. funds or drawn on a U.S. bank. If you reside outside USA, please use an International or U.S. Postal Money Order. MSU accepts the following credit cards: MasterCard, Visa, Discover, and Novus. Requests for refunds must be made in writing to the address on the back of this page. The fee, less \$20, will be refunded if cancellation is made before May 30, 1997. Any cancellations made after this date are non-refundable.

Housing Registration Form
August 17-20, 1997
Meal Package through Residence Hall
Dining Includes:
Monday, August 18 Breakfast
Tuesday, August 19 Breakfast
Wednesday, August 20 Breakfast
Total Meal Package: *\$12.15
*(Includes a 10% discount)
Meals can also be purchased on a cash basis at various locations in Strand Union Building.

Room Package includes:
Sunday, August 17 through Tuesday night August 19.
*Additional nights can be purchased on a per-night basis at \$13.00 per person per night, double occupancy, and \$17 per night, single occupancy plus a 4% accommodations tax.
Please check appropriate spaces, enter all costs, and total.
Room/meal options: # People Price Total
Single Room/Meal Package X \$65.19
Double Room/Meal Package X \$52.71
(Based on per person charge)
Single Room Only X \$53.04
Double Room Only X \$40.56
Meal Package only X \$12.15
TOTAL ENCLOSED _____
Name _____
Sex (M) (F) Roommate Requested _____
Bozeman is served by Delta, Horizon, and Northwest airlines. A list of off-campus accommodations (motels and bed and breakfasts) is available upon request at the address below.
Return completed form and check, money order or credit card number with type of credit card, expiration date, and exact name appearing on credit card to:
Wild Trout VI
Conference Services, Room 280F Strand Union
MSU-Bozeman, P.O. Box 174150
Bozeman, MT 59717-4150
Phone: (406) 994-3333 Fax: (406) 994-3228
E-mail: acfjh@msu.oss.montana.edu

