



VOLUME 1 • NO.2

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DELTA ECOLOGY RECEIVES BOOST

The recent (July 28) decision by the State Water Resources Control Board (No. 1379-Sacramento-San Joaquin Delta) was hailed by conservationists as a welcome boost to the protection of the fish and wildlife resources of the Delta. The decision centered on the establishment of specific standards for the maintenance of water quality in the lower Delta. In its decision the Board indicated its intent to give first priority to satisfying all needs for water in the Delta and to relegate to second priority all exports of water from the Delta to other areas for any purpose.

After considering the plans for the State Water Project and the Central Valley Project, the Board stated that needs in the Delta are a primary responsibility of these projects and have the effect of modifying any general water development plans affected thereby. The Board also concluded that the outflows necessary to supply the qualities that vested rights and fish and wildlife require, to the extent such outflows conform to constitutional mandate, constitute prior demand on the supply which is not available to the state and federal projects.

CNC President Skinner described the reports as " ... an outright commitment to the cause of ecology and the environment. The Board leaves no doubt about its intention to protect fish and wildlife and other beneficial uses of water in the Delta," he stated.

Fish Standards

Standards for the protection of striped bass, salmon and steel head adopted by the Board are as follows:

Striped bass. (a) For a five week period in the spring, after the water temperature in the Delta reaches 60° F, the mean daily salinity content shall not exceed approximately 1,000 ppm TDS at Antioch and 350 ppm TDS at Prisoner's Point. (Intended to provide optimal conditions for spawning.)

(b) Export pumping of water from the Delta shall be restricted during the five week period of April 25 through May 31. (Intended to minimize the loss of eggs and larvae.)

(c) The mean daily concentration of chloride at Chipps Island shall not exceed 4,000 ppm. (Intended to protect *Neomysis*.)

Salmon and Steelhead. (a) A positive downstream flow shall be maintained in all principal channels of the Sacramento-San Joaquin Delta, including below the proposed peripheral canal intake, and in the San Joaquin River from the head of Old River to Antioch. (b) There shall be a sufficient supply of water of San Joaquin River origin flowing through natural channels to produce and maintain a

(Continued on page 2)

FISH AND GAME CONSERVATION EMPLOYEES ASSOCIATION FORMED

With hopes of succeeding where others have failed, Harvey Russo and Jim Bower of California DFG's Region 2 office in Sacramento, embarked early this year on an ambitious project to bring together all Fish and Game Department employees in an Association to provide " ... a voice and representation in the administration of their affairs." Thus was born the Fish and Game Conservation Employees Association. With membership open to all fisheries and wildlife employees from the Seasonal Aid to the Regional Manager-Branch Chief level, close to 80 people have joined so far.

Russo and Bower point out that this is not a professional association like the Wildlife Society or the Fisheries Society, but rather parallels the Warden's Association in its intent and goals. Citing examples of how the Warden's Association has fostered and brought about favorable legislation, such as the one which states that a heart attack occurring in an employee after 10 years of service is prima facie evidence that such ailment is service connected and that he shall be compensated for it, and such things as better working conditions and equipment, they hope to apply the same efforts and attempt to obtain similar results for the fish and wildlife conservation employees. "This Association can affiliate with the CSEA, and by weight of its membership obtain greater effort on their part to assist us in many of these aims," they noted.

Under present law the duly appointed representative of this Association will have the right to appear at Personnel Board hearings when salaries or classification, or matters of this sort are being considered, to directly represent the employees involved. He further has the right to discuss directly with the Director, Deputy Director, and Chief of Operations all matters pertaining to the welfare of the employees. "We feel sure that a solid block of the fish and wildlife employees with proper representation will receive greater consideration from the Department administration and from other departments within the State, such as the Personnel Board, [than they have in the past.] It is not our intention to be a militant organization," they added. "But we do want our voice and our needs to be heard and recognized."

Seven members of the Association were elected recently to a Board of Directors, including three members of our AFS California-Nevada Chapter, Jim Maddox, Tim Farley, and AI Petrovich. The Board was to meet on August 20 in Sacramento to select officers, outline objectives and to plot a course of action. ••

TREASURER'S REPORT

for Period January 28 to May 1, 1971

| | |
|---|-----------------|
| Balance January 28, 1971: | |
| Savings Account | \$213.06 |
| Checking Account | <u>343.83</u> |
| Total | \$556.89 |
| Income: | |
| Net Income from 1971 Meeting | \$139.85 |
| Interest on Savings Account, first quarter | <u>2.68</u> |
| Total Credits: | \$142.53 |
| Disbursements: | |
| Cash (Xerox Address Labels) | \$ 3.00 |
| Don Fry (Photo Contest Expense) | 27.75 |
| George Allen (Contribution to Cons. League) | 25.00 |
| Cash (Photo Development) | 1.13 |
| Cash (Xerox address labels) | 7.00 |
| Total Disbursements: | <u>63.88</u> |
| Total Balance Forwarded May 1, 1971: | <u>\$635.54</u> |

EXCOM TO MEET AT GRAY LODGE

The next meeting of the Executive Committee of the California-Nevada Chapter of AFS will be held at Gray Lodge State Wildlife Management Area near Gridley, California on November 13, 1971. A joint meeting with the Executive Committee of the California-Nevada Section of the Wildlife Society is planned at this time, also. CNC Committee chairmen are reminded to reserve this date on their calendar for this important meeting. ••

DELTA ECOLOGY (Cont.)

predominance of San Joaquin River water in the southern and eastern portion of the Delta from September 1 through November 30 each year. (c) Facilities of the State Water Project and the Central Valley Project shall be designed, constructed and operated to minimize interference with downstream migrants, and reasonable measures undertaken to salvage those diverted by project works. For purposes of definition, a reasonable objective is to salvage 95% of those downstream migrants approaching salvaging facilities.

These standards basically follow the California DFG's findings relative to the conditions required for the protection and enhancement of these species. "The State Water Resources Control Board is to be commended for this important decision," stated Skinner. "It warrants strong support by conservationists in general, and by professional fisheries people, including our Chapter, in particular." ••

AWARDS COMMITTEE APPOINTED

Following the recent approval by the membership of the addition of part b, Section 7 to the Chapter bylaws, President Skinner has moved to form the first CNC Awards Committee. George McCammon, who will become California DFG's Environmental Services Branch Chief in September, has consented to chair this committee. Serving with George will be Leo Shapovalov and Elden Vestal, also of the California DFG, and Oscar Sette with the National Marine Fisheries Service, Menlo Park, and Tom Trelease, Chief of Fisheries of the Nevada Fish and Game Department, Reno. CNC members are urged to present nominees for either the Membership Award of Excellence, or the Conservation Achievement Award, to any Awards Committee member for their early consideration. Successful candidates will be honored at the 1972 meeting. ••

PAST OFFICERS

How's your memory? The following is a list of the past officers of the California-Nevada Chapter of the American Fisheries Society. Now in its eighth year, it seems timely to recall the officers who have served the chapter since its formation in 1964.

| Year | <u>President</u> | <u>Vice President</u> | <u>Secretary-Treasurer</u> | <u>Treasurer</u> | <u>Newsletter Editor</u> | <u>Location of Annual Meeting</u> |
|------|---------------------------|-----------------------------------|----------------------------|----------------------------|--------------------------|-----------------------------------|
| 1964 | Paul Jensen | Richard Ridenhour | James Adams | | | San Francisco |
| 1965 | Harold K. "Pete" Chadwick | George McCammon | John E. Skinner | | | San Francisco |
| 1966 | George McCammon | Robert L. Eberhardt ^{1/} | Leo Pinkas | | | San Diego |
| 1967 | Richard L. Ridenhour | Richard R. Whitney ^{2/} | Leo Pinkas | | | No Meeting ^{3/} |
| 1968 | Richard L. Ridenhour | Cecil Martin | Leo Pinkas | | | Davis |
| 1969 | Cecil Martin | George H. Allen | Emil Smith | | | Fresno |
| 1970 | George H. Allen | John E. Skinner | Emil Smith | | | Sacramento |
| 1971 | John E. Skinner | James Burns | Brian Waters ^{4/} | Dale Lockard ^{4/} | Steve Nicola | San Luis Obispo |

1/ Robert Barrett who was originally elected never served. Robert Eberhardt was appointed to fill the vacancy.

2/ Richard Whitney who was elected was transferred shortly thereafter and Cecil Martin was appointed to fill the vacancy.

3/ There was no annual meeting and consequently no election of officers for 1968-69. Therefore the previous officers were held over for the 1968-69 term.

4/ Separate offices of Secretary and Treasurer created at 1971 meeting.

EDITORIAL

A recent issue of *Outdoor California*, the popular magazine of the State Department of Fish and Game, was devoted exclusively to articles on California's nongame fish and wildlife, particularly its rare and endangered species. It was a neatly assembled package designed to convince the public of what a great job the department is doing to manage nongame species and to protect and preserve the 43 species of rare and endangered resident wildlife, including 9 species of fish. Some readers may have concluded that the State is doing its job, but the discerning reader will have no trouble in observing the inadequacy of these efforts.

Consider these distressing facts: (1) The expenditure of "more than \$134,000 each year in researching the status of nongame fish and wildlife" (p.24) represents an investment of but \$ 3,116 per species. Even if this amount were spent on only the endangered species (19), that would amount to only \$7,052 each. We ask, how can the annual expenditure of this paltry sum secure the preservation of these animals in perpetuity? Under these conditions it is difficult even to see how all of these species can be adequately "researched," even if only to determine their status.

(2) The department's 1971-72 operating budget of some 22 million dollars is financed almost entirely from the sale of fishing and hunting licenses. Thus, 3 million hunters and fishermen are directly subsidizing 18 million non-hunting and fishing Californians who presumably benefit from the non-consumptive uses of all wildlife, and who presumably share a common interest in the protection of rare and endangered species. An economist would pale at the diseconomies associated with this imbalance.

The above figures indicate that under present conditions California's investment in its fish and wildlife resources on a per capita basis amounts to approximately \$1.00 per year. For rare and endangered species this figure shrinks to a microscopic 6/10 of 1¢ per year. If the State ever hopes to effectively manage and protect all of its nongame fish and wildlife, the Department of Fish and Game needs to be given the wherewithal to get the job done. A substantial amount of additional revenue to finance effective research and management programs will certainly need to be forthcoming soon. The Governor, the Legislature, and especially the public must be made aware that it is time for all citizens to share the financial responsibility for the management of these valuable resources.

While we sympathize with the Department of Fish and Game in wanting to impress the public with its concern, we fear it may have missed an excellent opportunity to sell the public on the need for a broader-based and increased level of financing for its work with nongame species. We further hope that the readers of *Outdoor California* are not content with the current level of efforts expended on behalf of rare and endangered species. \$134,000 a year will not buy very much time for the California brown pelican, California condor, Southern bald eagle, American peregrine falcon ...••

BALLOT RESULTS

Results of the recent balloting (via mail through the 1st issue of *Pisces*) were greeted with mixed emotion by the Executive Committee as they were announced at the recent Excom meeting by Secretary Waters. Although members were gratified that overwhelming approval was given each of the measures, they expressed disappointment that only 10% of those receiving ballots chose to vote. The results of the balloting follow.

| | Percent | |
|---|---------|----|
| | Yes | No |
| Section 10 - Dues and Registration Fees (a) | | |
| Annual meeting registration fee (b) | 85 | 15 |
| Annual Chapter dues (\$2.00) | 87 | 12 |
| Section 7 - Chapter Committees | | |
| (b) Awards Committee | 92 | 8 |
| (i) Membership award | 92 | 8 |
| (ii) Conservation achievement award | 87 | 12 |

IN MEMORIAM - FRED GROH

Fred Groh, Fish Hatchery Manager II in charge of Feather River-State Hatchery, Oroville, and long-time AFS member, passed away July 30 following a 7-month battle with cancer. He was 56. Fred joined the California DFG in 1951 as a Fish Hatchery Assistant at Kernville. In 1957 he became a Fisheries Manager I and assistant hatchery manager at San Joaquin State Hatchery in Friant. Following promotion to a Fisheries Manager II, he became manager of the Mokelumne River Fish Installation in 1965. He transferred to Oroville in 1967. ••

KEEP ADDRESSES CURRENT

Members are reminded to keep their mailing addresses current by reporting any changes to Emil Smith, Marine Resources Branch, California Department of Fish and Game, 1416 9th St., Sacramento, CA 95814. This will assure the prompt delivery of your *Pisces* and will facilitate the conduct of other Chapter business. We suggest that new members list their business address and that currently enrolled members report their business address for any subsequent changes. The primary reason for this is that business addresses are less likely to change as frequently as residence addresses. With Chapter members constantly on the move it will relieve us of a tremendous burden if everyone will make an effort to send Emil or the *Pisces* editor a Postal Service address change card or a simple note as soon as a new address becomes available. ••

| CALIFORNIA-NEVADA CHAPTER OF THE AMERICAN FISHERIES SOCIETY | | | |
|---|-------------------|--|----------|
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| Vice-President | James W. Burns | Department of Fish and Game 987 Jedsmith Drive Sacramento, CA 95819 | 445-0866 |
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| Treasurer | Dale V. Lockard | Fish and Game Department P.O. Box 4336 Las Vegas, Nevada 89107 | 385-6380 |
| Past President | George H. Allen | Div. of Natural Resources Humboldt State College Arcata, CA 95521 | 826-3448 |
| 1972 PROGRAM COMMITTEE | | | |
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| Local arrangements | M. J. Whittis | Natural Resources Manage. Dept. Calif. State Polytechnic College San Luis Obispo, CA 93401 | 62B-2702 |
| Photo contest | Dan Gottshall | Department of Fish and Game 350 Golden Shore Long Beach, CA 90802 | 435-7741 |
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COMMITTEE ACTIVITY

Executive Committee

The Executive Committee of the California-Nevada Chapter of the American Fisheries Society met at Plumas Eureka State Park, California, on July 10, 1971. In attendance were: President, John Skinner; President-Elect, James Burns; and Secretary, Brian Waters. Also in attendance, but not as a voting member, was Newsletter Editor Steve Nicola. Unable to attend were: Immediate Past President, George Allen; and Treasurer Dale Lockard. President Skinner called the meeting to order at 10: 15 a.m.

Newsletter Editor Nicola reported a total printing and mailing cost, including \$30.00 for a one-year second class mailing permit, of \$163.14 for the first issue of the chapter newsletter, *Pisces*. It was moved by Nicola, seconded by Waters, and passed unanimously that this total be paid to the publisher, Roger C. Franke. Nicola also reported personal expenses of \$5.56 incurred by him in getting out the newsletter. It was moved by Waters, seconded by Burns, and passed unanimously that Nicola be reimbursed for these expenses. Nicola reported that 37 newsletters were returned with address corrections, and that most of them appeared to be for students. He also reported that the corrections were forwarded to Chapter Membership Committee member, Emil Smith.

The possibility of establishing a liaison between the Chapter and the California Wildlife Federation (CWF) was discussed. President Skinner outlined the structure of the liaison between the CWF and the California-Nevada Section of TWS, in which they have monthly meetings to exchange information of common interest.

President Skinner next mentioned the recent establishment of the Institute for Technology and Society at Sacramento State College. Although its members are primarily from the engineering field, its scope is multidisciplinary. President Skinner is presently exploring the potential of our Chapter affiliating with the Institute.

President Skinner next brought up the subject of a proposed AFS-TWS joint study team to document the history of studies and status of the Sacramento-San Joaquin Delta, with particular reference to the proposed peripheral canal. Dr. A. Starker Leopold has been asked to chair this proposed jointly sponsored committee.

President Skinner reported that both AFS and TWS had been invited to participate in a two-day workshop on resource management principles sponsored by the CWF at their annual meeting to be held at Asilomar in March 1972. Our Chapter would probably provide four to eight participants to the workshop. The Excom noted that this would be a worthy endeavor.

The next subject of discussion was of the establishment of a professional register of Chapter members. The register would catalog the areas of expertise of the members to be used in time of need by the Chapter. The consensus was that this would be a very desirable undertaking, particularly in view of the broadened base of activities in which the Chapter is becoming involved. The only cost involved would be that of printing and mailing a questionnaire, which could probably be done in connection with the newsletter.

The meeting was adjourned at noon and reconvened with members of the California-Nevada Section of TWS at 1: 15 p.m. for discussion of plans for the next annual joint conference to be held on the San Luis Obispo Campus of California State Polytechnic College on January 28 and 29, 1972.

Doug Donaldson, representing himself and Jack Whalls, reported on the status of their local arrangements work in San Luis Obispo. One large meeting room and one smaller

meeting room, plus an area for the photo contest will be available on the Cal Poly Campus. Arrangements have been made for the banquet to be held at the Elks Club.

Following a discussion on the subject, it was decided that AFS and TWS would provide conference registrants with individual options to cover fees for registration, conference proceedings, and meals, rather than have a single package deal available. This should provide more flexibility for the attendees. It was also decided by majority vote to have a reduced registration fee for students. ••

WESTERN DIVISION MEETING

The 23rd annual meeting of the Western Division of the AFS was held in July in Aspen, Colorado. National President Bob Jenkins, First Vice President Chuck Campbell, and Executive Secretary Robert Hutton were on hand.

A highlight of the business meeting was the announcement that Alex Calhoun, Chief of the Inland Fisheries Branch of the California Department of Fish and Game had been selected to receive the first Western Division "Special Award." The award, in this instance an engraved plaque, is designed to recognize a member for outstanding contribution to fisheries management, research or the fisheries profession. The plaque was presented at the banquet to G. Ray Arnett, California DFG Director, to give to Alex who could not attend the meeting.

Resolutions Passed

The resolution commending the Department of the Interior and officials of the U.S. Fish and Wildlife Service, authored by CNC President Skinner and originally sent to Executive Secretary Hutton, was referred to the Western Division for action and was passed. (The resolution appears in the May 1971 *Pisces*.) Additional resolutions passed by the Western Division were the following.

Resolution No.2 Public Land Law

WHEREAS, the Public Land Law Review Commission has released their report entitled, "One Third of the Nation's Land" in June 1970; and

WHEREAS, the report is voluminous and requires considerable study and thus, time; and

WHEREAS, a number of recommendations in the report are of deep concern to fisheries scientists and may have a serious impact on the fisheries resources; and

WHEREAS, a number of Federal bills are forthcoming as a result of the Public Land Law Review Commission report; and

WHEREAS, time will be of the essence in providing views relative to the various bills which will be introduced; and

WHEREAS, the Western Division of the American Fisheries Society does not have the machinery within its administrative procedures to establish its policies and positions without a rather laborious contact with its respective members,

NOW THEREFORE BE IT RESOLVED that the Western Division of the American Fisheries Society appoint an Ad Hoc Committee representative of the various fishery interests; and

BE IT FURTHER RESOLVED that this Committee study the various future bills pertaining to public lands and recommend to the Executive Committee a position for the Western Division of the American Fisheries Society in regard to this legislation.

President Skinner has told *Pisces* that the formation of this committee by the Division obviates the need for a similar committee in the CNC. At the request of the Division, a representative of the CNC, Charles Selden, was appointed to represent our Chapter on this committee. (See news item elsewhere.)

NOTE-WORTHY NEWS

Bruce Kimsey, former California Department of Fish and Game biologist and long-time AFS member, has returned to California after a ten year absence. Bruce has taken a job as Environmental Quality Officer in the Bureau of Reclamation's regional office in Sacramento. He will work directly under Regional Director Pafford, and will advise the Bureau on environmental matters relating to Bureau projects. With the Department of Fish and Game 14 years, Bruce left in 1961 to join the Bureau of Commercial Fisheries and in 1966 moved to the Bureau of Sport Fisheries' and Wildlife. Late in his career with the department, and throughout his career in Federal service he undertook various assignments with the U.N. Food and Agriculture Organization and the U.S. Aid program in both Africa and South America. He has been a member of the AFS for 20 years.

Speaking of foreign assignments, Almo Cordone is due back September 1 from Uganda after completing 2 years of research on Lake Victoria with the East African Freshwater Fisheries Research Organization, under the auspices of FAO. Almo was the last person in the California Department of Fish and Game to be granted a leave of absence prior to the abolition of such leaves by Director Arnett. He will be returning to the Delta Study of the Anadromous Fisheries Branch in Stockton to study algae and zooplankton in the Delta environment.

Leo Pinkas Senior Marine Biologist with the California DFG in Long' Beach, recently served on a committee of environmental specialists called together by the City ~f Long Beach to aid in the formation of a governmental unit to advise the city on environmental matters.

Charles Selden, former California DFG fisheries biologist and now Deputy County Counsel for Humboldt County, was appointed by CNC President Skinner to serve on the Public Land Law Review Study Committee of the Western Division of the AFS .

Membership on the CNC Endangered Species and Habitat Committee was increased by 1 recently with the appointment of Phil Pister, Associate Fisheries Biologist with the California DFG in Bishop. Phil is also a member of the Advisory Committee of the Desert Fishes Council, and has been personally involved in efforts to save the endangered Owens Pupfish.

Don Kelley alternating between California and Rome in recent years, is now, we hear, back in California. Don has returned to consult with the Metropolitan Water District of southern California on matters relating to the proposed Peripheral Canal.

Congratulations to George McCammon, principal fish and wildlife manager with the California DFG, Sacramento, for being named the DFG's Environmental Services Branch Chief.

Louis Carufel, formerly Chief Aquatic Biologist with the Massachusetts Division of Fish and Game, has taken a job with the U.S. Forest Service in Eureka, California. Shortly after arriving in California a few weeks ago, he was appointed by President Skinner to the CNC Membership Committee.

James Howten was appointed recently by President Skinner to replace Ron Schultze as chairman of the Student Affairs Committee. Jim is a graduate fisheries major at Sacramento State College in California. ••

1972 MEETING

Plans are developing for the 1972 annual meeting in San Luis Obispo, California on January 28 and 29. CNC Program Chairman Jim Burns reports that the theme of the conference to be held jointly with the California-Nevada Section of TWS, will be "Progress and the Environment." He announced that Thomas Kimball, Executive Director of the National Wildlife Federation, will address the conference. The welcoming duties may be shared by the directors of the fish and game departments of both California and Nevada. "We are still working on that," he stated. "We are hoping that many outsiders from both development and conservation fields will be able to participate in the program," Burns added.

Call for Papers

Those wishing to present papers in the fisheries technical sessions at the 1972 meeting are requested to submit tentative titles of their papers as soon as they are available to Program Chairman Burns. ••

NEW PROCESS TO REMOVE MERCURY

The nation's largest producer of mercury chemicals, Ventron Corporation, has announced a new process that will remove mercury from industrial wastes. The process uses sodium borohydride, a chemical that reacts with mercurous and mercuric ions, reducing them to elemental mercury. The system, presently being installed in Ventron's Wood Ridge, New Jersey plant, is designed to recover up to 100 ppm from 15,000 gallons of effluent. The final run-off is expected to contain less than one part per billion.

Although sodium borohydride sells for \$13 per pound, one pound can produce 21 pounds of medium-grade mercury worth \$105. Thus, mercury extraction may shortly become an extremely profitable business for both industry and the environment.

... *Massachusetts Wildlife*

WESTERN DIVISION MEETING (Cont.)

Resolution No.3. Foreign Tropical Fish Introduction

WHEREAS, the introduction of foreign tropical fish into the United States is rapidly growing; for example, during the month ending February 23, 1971, over 4 million individual tropical fish shipped in over 100,000 gallons of water entered the northwest ports alone, and

WHEREAS, these fish and the water they are transported in are a potential source of biological contamination because the fish are not examined for disease and the water is of questionable purity; and

WHEREAS, these fish end up in homes and our natural waters, posing a possible threat to the person handling the fish and our native fish; and

WHEREAS, there are already several federal and state government agencies preventing entry of dangerous or questionable plants and animal matter;

NOW THEREFORE BE IT RESOLVED that the Western Division of the American Fisheries Society urge the Secretary of Interior to initiate and coordinate studies between fish disease experts and the public health authorities to determine if the growing volume of live fish importation, especially tropical fish, does or does not constitute a source of potentially dangerous biological contamination. ••

1971 PHOTO CONTEST

Detailed Results

SLIDES (continued)

BLACK AND WHITE PHOTOS

| | | | |
|------------------------|---|--------------|------------------------------|
| Fish | 1 | Mike Johnson | <i>Garibaldi</i> |
| Birds | 1 | Harry Morse | <i>Owl</i> |
| | 2 | John Cowan | <i>Great Blue Heron</i> |
| | 3 | John Hewston | <i>Waterfowl at Sunset</i> |
| Wildl./Fish Management | 1 | John Cowan | <i>Mourning Dove on Nest</i> |
| Nature/Misc. | | | |
| | 1 | Dick Heimann | <i>Trees in the Snow</i> |
| | 2 | John Cowan | <i>Young Deer</i> |
| Mammals | 3 | Dan Gotshall | <i>Crab</i> |
| | 1 | John Cowan | <i>Muskrat</i> |
| | 2 | Mike Johnson | <i>Fawn</i> |
| Picture Story | 3 | John Hewston | <i>The Beachcomber</i> |
| | 1 | Dan Gotshall | <i>Hermit Crab</i> |
| | 2 | John Cowan | <i>Albino Deer</i> |

| | | | |
|------------------------|---|---------------|--------------------------------|
| Nature Misc. | 1 | Dan Gotshall | <i>Feather Star</i> |
| | 2 | Bob Martin | <i>Red Squirrel with Cones</i> |
| | 3 | John Borneman | <i>Masai Giraffe</i> |
| Wildl./Fish Management | 1 | Mike Johnson | <i>Electro-Fishing</i> |
| | 2 | Fritz Winter | <i>Guzzler Installation</i> |
| | 3 | Dan Gotshall | <i>Crown of Thorns</i> |
| Picture Story | 1 | Jack Wilburn | <i>Herons</i> |
| | 2 | Don Fry | <i>Swallowtail</i> |
| | 3 | Bob Martin | <i>Lion</i> |

GRAND CHAMPION

Bighorn Ram Alfred Adams

COLOR PHOTOS

| | | | |
|------------------------|---|------------------|---------------------------------|
| Mammals | 1 | John Cowan | <i>Raccoon with Eggs</i> |
| | 2 | Alfred Adams | <i>Bighorn Ram</i> |
| | 3 | Mike Johnson | <i>Sea Otter</i> |
| Birds | 1 | John Cowan | <i>Avocet Nestlings</i> |
| | 2 | Bob Martin | <i>Spikes Weaver</i> |
| | 3 | Marvin Hoffer | <i>Spring Snow</i> |
| Fish | 1 | Marvin Hoffer | <i>Steelhead Country</i> |
| Nature Misc. | 1 | Dick Heimann | <i>Rainbow</i> |
| | 2 | John Cowan | <i>Sunset (or Sunrise?)</i> |
| | 3 | Marvin Hoffer | <i>Crack of Dawn</i> |
| Picture Story | 1 | Marvin Hoffer | <i>To Kill a Stream</i> |
| | 2 | Jerry Mensch | <i>Desert Bighorn Sheep</i> |
| | 3 | John Cowan | <i>Garter Snake Eating Frog</i> |
| Wildl./Fish Management | | Warren Rienecker | <i>Net Trapping Waterfowl</i> |

SLIDES

| | | | |
|---------|---|---------------|--------------------------------|
| Mammals | 1 | Don Fry | <i>Longtail Weasel</i> |
| | 2 | S. Ford | <i>Elk</i> |
| | 3 | Jack Wilburn | <i>Eastern Fox Squirrel</i> |
| Birds | 1 | Jack Wilburn | <i>Killdeer with Young</i> |
| | 2 | F. Crase | <i>Death on High Wire</i> |
| | 3 | John Borneman | <i>Fairy Terns</i> |
| Fish | 1 | Dan Gotshall | <i>Gobies</i> |
| | 2 | Dan Gotshall | <i>Sharpnose Puffin</i> |
| | 3 | Mike Johnson | <i>Garibaldi and Sheephead</i> |

GOLDEN TROUT WILDERNESS PROPOSED

A proposal for a Golden Trout Wilderness in the Inyo and Sequoia National Forests is being studied by the Forest Service. The study area of about 160,000 acres contains the original range of the California state fish, the golden trout. Information on the proposed wilderness can be obtained from the Forest Supervisor of either National Forest or from the DFG's regional offices in Long Beach or Fresno. ●●

CLASSIC CONFRONTATION

A classic confrontation is expected in mid-September when the Senate Interior Committee begins hearings on S.717, establishing the Hell's Canyon-Snake National River in the Pacific Northwest. Conservationists square off against potent electric power and irrigation interests which do not want the scenic river preserved as a free-flowing stream. The Senate has approved a seven-year moratorium on Snake River construction, but if the congress does not clear one of the bills, the Federal Power Commission likely will license a two-dam project which may sound the death knell for salmon and steel head in the Columbia basin. ●●