

1986
Course Catalog

The Yellowstone Institute

Phillips / Reese
YI Collection

Field Courses
In Yellowstone:
Experience Yellowstone
With the Experts
Unique Learning
Vacations



Choices For All Ages
Two to Eight Days
Options For Academic Credit

The Eleventh Annual Yellowstone Institute
PRESENTED BY THE YELLOWSTONE ASSOCIATION
YELLOWSTONE NATIONAL PARK

THE YELLOWSTONE ASSOCIATION

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CALENDAR

Date	Course
June 9-10	The Folklore of Bears
June 11-13	Biology of Grizzly Bears
June 14-15	Elk of Yellowstone
June 16-20	Large Mammals of Yellowstone
June 20-23	Wildlife Photography
June 21-22	Yellowstone's Birds of Prey
June 23-27	Lakes of Yellowstone by Canoe
June 23-27	Geology of Yellowstone
June 28-29	Early Exploration in Yellowstone
June 29-July 3	Birds of Yellowstone
June 30-July 9	Hydrothermal Systems of the Yellowstone Calderas
July 5-6	The First People and Yellowstone
July 11-14	Learning Outdoor Photography
July 12-13	Wildflowers of Yellowstone
July 14-17	Small Mammals of Yellowstone
July 15-16	Wildflowers of Yellowstone
July 15-19	Backcountry Photography
July 18-20	Mountain Medicine: The Wild Herbs of Yellowstone Country
July 18-22	Horsepacking: Old Faithful-Bechler
July 19-20	Wolves of Yellowstone: The Missing Link
July 21-22	Interpreting Yellowstone with "Ranger Ted"
July 21-23	Fire, Ice and Fossil Forests
July 21-24	Mammal Tracking: Interpreting Tracks, Scat, and Other Sign
July 23-27	Horsepacking: Nez Perce Trail
July 24-27	Yellowstone's Night Skies
July 25-28	Aesthetics in the Natural Environment
July 28-30	Three Days at the Buffalo Ranch (For Ages 8-12)
July 28-30	Geysers, Mudpots, & Hot Springs
July 30-Aug. 1	Advanced Yellowstone Aesthetics
July 31-Aug. 1	Wilderness Hiking and Camping in Grizzly Country
Aug. 1-2	Artists in Yellowstone
Aug. 1-3	Three Days at the Buffalo Ranch (For Ages 8-12)
Aug. 4-5	Interpreting Yellowstone with "Ranger Ted"
Aug. 4-6	The Ways of the Mountain Men
Aug. 4-8	Backcountry Photography
Aug. 7-8	Women and Wilderness: Introduction
Aug. 8-10	Fly Fishing: Less Experienced
Aug. 9-10	Women and Wilderness: Overnight
Aug. 10-12	Star Trails West
Aug. 11-12	The Bison of Yellowstone
Aug. 13-14	Family Days at the Buffalo Ranch
Aug. 15-17	Fly Fishing: More Experienced
Aug. 15-17	Wilderness Images: Telling the Story with Film and Video
Aug. 17-21	Horsepacking: Washburn Trail
Aug. 29	Bald Eagles of Greater Yellowstone
Aug. 30-31	Women and the Natural World

The Yellowstone Association for Natural Science, History & Education, Inc. is a non-profit, tax-exempt organization founded in 1933 to assist with educational, historical, and scientific programs in Yellowstone National Park which aid interpretation and related visitor service activities of the National Park Service.

The Yellowstone Association
P.O. Box 117
Yellowstone National Park, Wyoming 82190

Phone: 307-344-7381
Extension 2349 Business Office
Extension 2384 Director's Office

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DIRECTORY

For General Information about
Yellowstone National Park camp-
grounds and opening and closing
dates contact:

Visitor Services 307-344-7381
Ext. 2283

Box 168
Yellowstone National Park, WY
82190

For Information about in-park
lodges, hotels, RV parks, marina,
and reservations contact:

TW Services, Inc. 307-344-7311
Yellowstone Park Division
Yellowstone National Park, WY
82190

For travel information from states
surrounding Yellowstone contact the
following:

Wyoming Travel Commission
Frank Norris Jr. Travel Center
Cheyenne, Wyoming 82002

Idaho State Travel Commission
Room 108 State Capitol
Boise, ID 83720

Montana Travel Promotion Bureau
Department of Commerce
Helena, Montana 59620

(Photos by Gene Ball except where
noted otherwise)

GENERAL INFORMATION

Tuition

Unless otherwise specified, the tuition charge does not include lodging, meals, books, course materials, transportation, or university credit fees.

There are discounts for current members of The Yellowstone Association or those who join when they enroll. Memberships are tax-deductible.

Registration

To register, complete and mail the attached registration form along with the tuition fee (and cabin fee if applicable).

Most courses are limited to fourteen participants. Early registration is advised.

Several weeks before class begins, each student will be mailed a Yellowstone National Park entrance and campground fee waiver plus a list of equipment to bring, course study materials, and recommended readings.

Cancellation Policy

Participants who cancel their registrations at least one month prior to the first day of class will receive an 80% refund of their tuition and a 100% cabin fee refund. Later cancellations will be refunded at this rate only if the vacancy can be filled from the waiting list.

A course may be cancelled if fewer than eight persons are enrolled one month prior to the opening date. Enrollees will be notified immediately, and a full refund will be mailed promptly.

Few courses are cancelled, but it is essential that registrants provide an address and phone number where they can be reached one month before the course starts. The registration form provides a space for this information.

Location

A majority (75%) of the courses are conducted out of the National Park Service facility at the historic Buffalo Ranch, which is located in the beautiful Lamar Valley in the northeast region of the Park. The road sign simply reads "Lamar Station," see map.

Cabins

There are thirteen sleeping cabins and a large building which contains a kitchen, two classrooms, and bathrooms. The facility, though clean and adequate, is fairly simple. Life there has been affectionately described as "indoor camping."

Cabins have two or three beds; one has four. They have no plumbing or heating. Everyone must bring his/her own sleeping bag.

Cabins are multiple-occupancy and most have two or three single beds. They have no plumbing, heating, or electrical outlets. Everyone must bring a sleeping bag.

The main building, located near the cabins, is heated and has three modern bathrooms with showers plus a modern kitchen where people do their own cooking.

Cabin reservations should be made when registering for class. The fee is \$6 per person per night. Space is limited. Request for cabin space for the night before and/or the night after class will be granted if possible.

For part of the season, cabins may be available without reservations on a first-come basis. Cabin rental for family members of participants may be allowed also. A copy of the Institute policy regarding accompanying family members will be mailed on request.

Although residency at Lamar is optional, participants and instructors from past years have found that this living situation contributed to their experience and learning about Yellowstone.

Lodging for Courses at Other Park Locales

Information about camping and lodging options will be sent upon request or when registration is received. For some classes, group campsites will be reserved. The Institute office is ready to assist or advise.

For classes which meet at Mammoth, Canyon, and Old Faithful, rooms are reserved through TW Services at a special rate for Institute participants. Due to demand for these rooms, early reservation is essential. Contact the Institute office for assistance and details.

Other Accommodations and Camping

For those who choose not to stay at Lamar, other nearby sites in the Park

include campgrounds at Pebble Creek (9 miles east) and Slough Creek (7 miles west) or lodging at Mammoth Hotel (29 miles west), Roosevelt Lodge (11 miles west), and Canyon Lodge (30 miles southwest). Motels are available outside the Park in Montana at Silver Gate (19 miles east) and Cooke City (23 miles east). A list of nearby facilities will be sent on request.

Food and Preparation

Unless otherwise specified, participants must provide their own food. There are stoves and refrigerators in the kitchen, but space is limited. Basic cooking and eating utensils are provided. Food preparation should be kept rather simple.

Academic Credit

Courses for which academic credit is available are so designated in the course descriptions. An explanatory sheet detailing number of credits, type of credit, registration costs, and the address of the accrediting institution will be sent to registrants who indicate they are enrolling for credit.

Credit seekers may be required to take an exam, submit field notes, and/or complete a post-course project.

Institutions which offer credit include the University of Montana, University of Idaho, Brigham Young University, and Ricks College. Registration forms for academic credit will be provided on the first day of the course. Students will be responsible for completing and mailing forms and paying the necessary fee for credit enrollment (usually about \$20).

Students may also seek to enroll through their own university under a plan for independent study. Cooperation from Yellowstone Institute personnel may be requested through the director's office.

Pets and RV Units

Pets are not allowed at Lamar, and use of camping and recreational vehicles is not permitted on the grounds at the Yellowstone Institute facility.

Transportation

Participants must arrange their own transportation to and from Yellowstone and to the location where the class begins on the first day. Where appropriate, vehicles will be provided for travel associated with the courses.

Weather

Much class time will be spent outdoors. Snow can fall any time in Yellowstone. Students should be prepared for a range of mountain weather conditions and possibly cold temperatures.

Physical Condition

Participants should be in good health for these courses which are conducted primarily in the field. Most will require at least some hiking at higher elevations. Classes which involve backpacking, horsepacking, and canoeing will be more demanding. Be sure to ask in advance if you have any questions on this matter.

Insurance and Liability

Participants must provide their own health and accident insurance. Please read and sign the liability waiver on the registration form.

Wyoming Recertification Credit

For Wyoming educators, most Institute courses have been approved by the Wyoming State Department of Education for recertification credit. There is no extra charge for this credit. Send a stamped, self-addressed envelope for details or enclose a note with the registration form.

Courses are marked to indicate

approval and the number of credit hours. For example, a course coded "WRC-1" has a Wyoming Recertification Credit value of one hour.

For other states, see the paragraph below.

Teacher Recertification Credit

Yellowstone Institute courses should meet the requirements set by state or local school agencies for recertification credit or professional growth. Institute personnel will lend assistance to any teacher who wishes to pursue the matter. Many school districts have guidelines for individual study projects which can be approved locally. In other cases a request must be submitted to the State Department of Education.

Books

Most courses will not require textbooks. Information on books will be mailed with the student packet along with how-to-order details.

Funding

In addition to tuition, funding for the Institute comes primarily through membership contributions plus other fundraising activities of The Yellowstone Association, a non-profit, tax-exempt organization.

Humanities courses offered by The

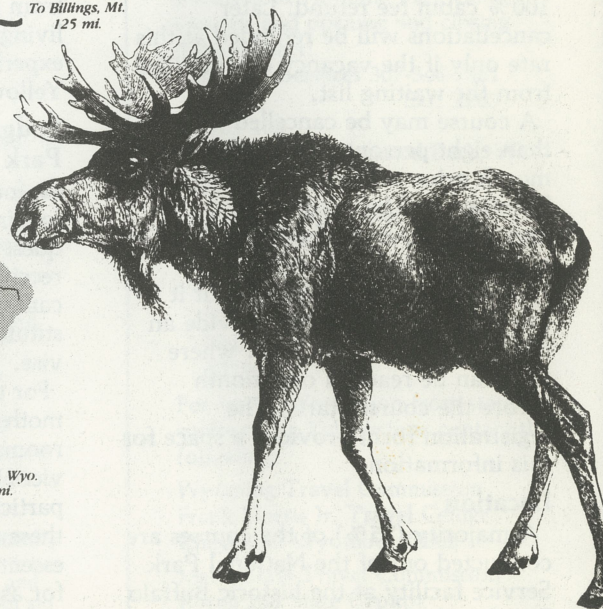
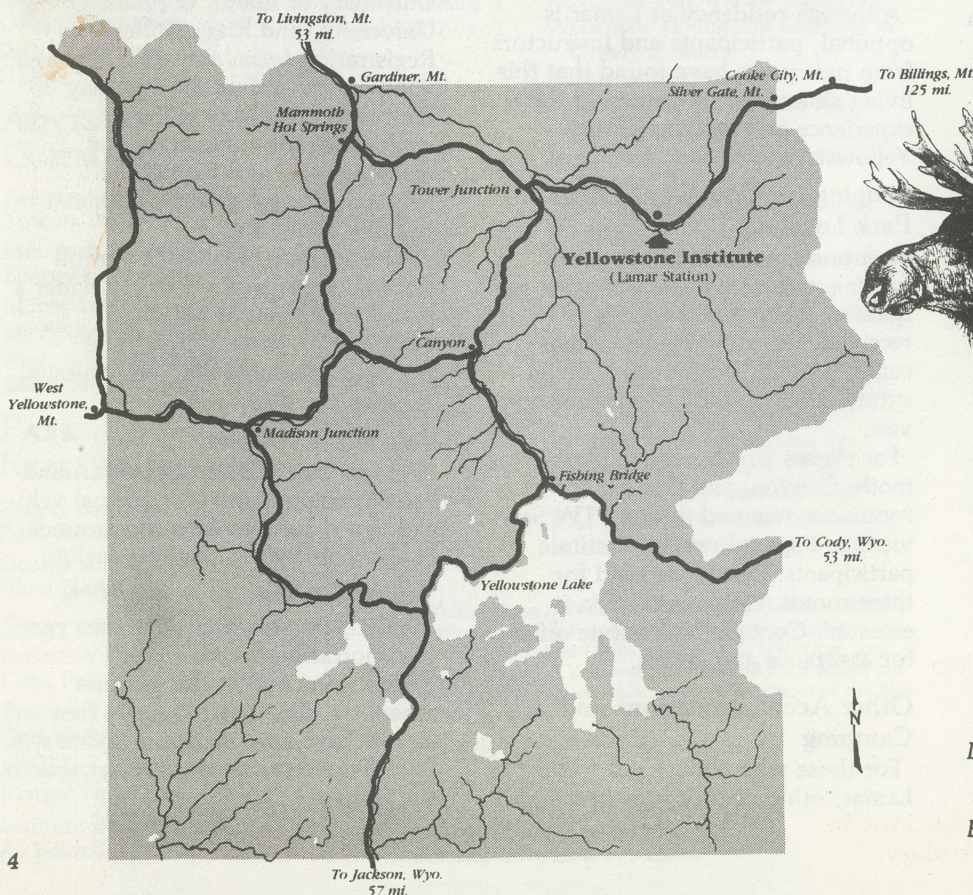
Yellowstone Institute were partially funded by grants from the Wyoming Council for the Humanities and the Association for the Humanities in Idaho in 1985.

For Additional Information
Write or Phone:

Yellowstone Institute
P.O. Box 117
Yellowstone National Park
Wyoming 82190

Director's Office at Mammoth Hot
Springs
307-344-7381 Ext. 2384

Institute Office at Lamar
(after June 10)
307-344-7749



Lamar Station
19 miles west of Silver Gate, Montana
11 miles east of Tower Junction
Elevation 6560 feet

Dear Reader,

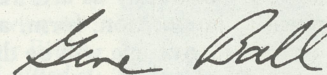
The Yellowstone Institute is a noble project and a grand way for you to see and appreciate Yellowstone. Whether you're seeking a new educational experience, a serene rejuvenation, a back-country adventure, an unusual and economical vacation, or academic credit, the Yellowstone Institute can be your source.

Of those who travel each year to this restless but enduring land, only one in ten thousand discovers and participates in the Yellowstone Institute. Through the Institute you can explore the secrets of

Yellowstone, learn about the wonders of the land and its life forms, enjoy a distinctive experience, meet people with similar interests, and learn from top-notch instructors who are knowledgeable, sensitive, and perceptive about their subjects.

Find a new part of yourself this summer. Join us at the Yellowstone Institute.

Sincerely,



Gene Ball, Director

1986 SUMMER FIELD COURSES

THE ELEVENTH ANNUAL
YELLOWSTONE INSTITUTE

The Folklore of Bears

June 9-10

\$65 (Members fee \$55)

WRC-1

The course will explore the folklore of bears as revealed by folktales, artifacts, ancient cults, and modern popular culture. Topics to be addressed include common themes in various cultures, the bear's role in folkstories, images of bears, and the role of bears in current American culture. Comparing and contrasting folk and scientific knowledge, and the importance of both, will be a continuing course theme. The class will meet outdoors as often as possible.

Jim Garry, is both a naturalist and a folklorist. His degree as a naturalist is from the University of Michigan as is his M.S. in Environmental Communications. He has worked on numerous wildlife research projects, primarily for Texas Parks and Wildlife. For the past decade he has been collecting folklore and presenting programs on the material, primarily in Wyoming. He is the founding director of Great Plains Lore and Natural History, Inc.

Biology of Grizzly Bears

June 11-13

\$105 (Member's fee \$95)

WRC-2

This course will cover the basic aspects of grizzly bear biology, including reproduction, behavior, food habits, home ranges, habitat use and population biology. The biological facts underlying the management of the Yellowstone grizzly will be reviewed. Approximately equal time will be spent in the classroom and in the field.

Harold Picton, Ph.D., is a professor of Wildlife Management at Montana State University. He has directed a number of graduate student studies of the Yellowstone grizzly, coauthored several scientific papers with members of the Interagency Grizzly Bear Study Team, and is a member of the grizzly bear committee of The Wildlife Society.

Elk of Yellowstone: Biology and Ecology

June 14-15

\$65 (Member's fee \$55)

WRC-1

Elk are the most abundant herbivore in the Yellowstone system, and as such, exert a major influence on the environment and its other inhabitants. Emphasis will be placed on population dynamics, feeding ecology,

migratory patterns, mortality factors, interaction with other herbivores, special management concerns, and current research. The instructor recently completed 4 months of intensive field observations for a behavioral comparison of the Yellowstone elk populations at Lamar, Mammoth, and Madison-Firehole and is beginning a long-term study of the latter population.

Ernest Ables, see write-up under "Large Mammals."



Large Mammals of Yellowstone

June 16-20

\$195 (Member's fee \$185)

WRC-2

Credit available (G or UG, 1 semester or 2 quarter hours)

The principles of animal behavior as they relate to the ungulates of the Yellowstone ecosystem will be investigated in this course. Elk, bison, bighorn sheep, moose, mule deer, and pronghorn will be observed. Emphasis will be placed on observing and recording behavior accurately, interpreting it properly, and analyzing its importance in ecology and management.

Ernest Ables, Ph.D., is Professor of Wildlife Ecology at the University of Idaho. He has spent the past 19 years conducting research, directing graduate students, and teaching. Large mammal ecology and the ecological aspects of animal behavior are his special interests, which have led him to study a wide variety of species in East Africa, Wisconsin, Texas, Idaho and Yellowstone.

Wildlife Photography in Yellowstone

June 20-23

\$155 (Member's fee \$145)

WRC-2

With Yellowstone as the focus, this course will emphasize the practical applications of photography rather than technical theory and assumes at least moderate photography experience. It will cover widely varying climatic and temperature zones and will approach outdoor photography as art. Techniques, use of light, equipment, composition, form, and development of the creative eye will be discussed. There will also be special emphasis on the ethics of, and various approaches to, wildlife photography. Participants must provide their own camera, lenses, tripod, film and any other accessories, and should be familiar with the operation of their equipment.

Tom McBride is recognized throughout the West as a photographer and multi-media producer. He has been commissioned by the Library of Congress for still photography; by United Artists for cinematography; and by Stephen Cross for films released by the British Broadcasting Corporation. His photographs have been featured in a number of national magazines and he was judged Photographer of the Year by the Montana Professional Photographers Association. He has taught many seminars in the United States and Canada and emphasizes environmental sensitivity along with photographic technique.

Yellowstone's Birds of Prey

June 21-22

\$65 (Members fee \$55)

WRC-1

This course features Yellowstone's hawks, eagles, falcons, and owls, collectively known as raptors, in their natural habitats. The role of predation in ecological communities, predator-prey relationships, breeding strategies, and habitat influences will be discussed in depth. The course will also examine management problems unique to this group of birds.

John W. Martin, is currently a regional fish and wildlife biologist for the Bureau of Reclamation. His research leading to a M.S. in Wildlife and Range Resources was based on Northern Harrier habitat utilization.

The Lakes of Yellowstone by Canoe

June 23-27

\$295 (Member's fee \$280)

WRC-2

Credit available (G or UG, 1 semester hour)

This five-day canoe trip across Lake Lewis and into magnificent Shoshone Lake will provide interpretation of the lake environment and instruction on low impact back-country camping techniques. Canoeing skills such as strokes, portaging, safety and tripping (how to pack a canoe) will be studied and American Red Cross canoeing certification may be earned if desired. Fee includes all canoeing equipment, group camping gear, and food.

David J. Thompson is supervisor of the Student Outdoor Program at Ricks College in Rexburg, Idaho. He has a master's in recreation and 13 years experience in the recreation field. He is the former State Trails Coordinator for the State of Idaho and is a certified Red Cross canoe instructor trainer. He will be accompanied by an experienced assistant.

Geology of the Yellowstone Country

June 23-27

\$195 (Member's fee \$185)

WRC-2

Credit available (G or UG, 2 quarter hours)

This course, conducted in the natural field laboratory of Yellowstone Park, will concentrate on the geological evolution of the area. Topics to be covered include volcanic rocks and processes, glaciation, earthquakes and faulting, hydrothermal features, sedimentary rocks and processes, metamorphism and tectonics. Completion of an introductory geology course is preferable but not required.

David Fountain, Ph.D. is an associate professor of geology at the University of Wyoming. He has taught numerous field courses in Yellowstone and Glacier National Parks and has served as co-instructor in a National Science Foundation course for science teachers. His research interests are crustal evolution and structure which he has studied in Europe, Canada, the northwest Pacific Ocean, and the Rockies.

Early Exploration in Yellowstone

June 28-29

\$65 (Member's fee \$55)

WRC-1

This course will review the earliest attempts to map and chart the Yellowstone wilderness, from James Stuart's trip in the 1860s to the famous Hayden Survey of 1871-72. The course will focus on the explorations of 1869-71



which led to the creation of the park. Readings, maps, historic photographs, and on-site visits to areas first visited by explorers will be included in the course.

Bill Lang, Ph.D., is currently editor of Montana the Magazine of Western History in Helena, Montana. He has served on the history faculty of Carroll College, the University of Montana and Montana State University. He has written numerous journal articles on the history of Montana and is author of Montana: Our Land and People.

According to A.L. Haines, author of *The Yellowstone Story, Volumes One & Two*, the name "Yellowstone" is derived from a Minnetaree Indian word, Mi-tsi-a-da-zi, which translated as "Rock Yellow River."

Birds of Yellowstone

June 29 - July 3

\$195 (Member's fee \$185)

WRC-2

Credit available (G or UG, 2 quarter hours)

This introductory ornithology field course will emphasize field identification and ecological relationships of birds in the Yellowstone ecosystem. Food chains, adaptations to hydrothermal environments, effects of fire on birds, and habitat selection will be among the many topics discussed during visits to a variety of habitats. Amateur birders as well as teachers, undergraduate and graduate students will find this course extremely informative. Participants must bring binoculars.

Richard F. Follett is author of Birds of Yellowstone and Grand Teton National Parks and Birds of Crater Lake National Park. He is a specialist on the birds of Yellowstone where he worked seven years as a ranger-naturalist and compiled the park's bird checklist.

Hydrothermal Systems of the Yellowstone Caldera

June 30 - July 9

\$315 (Member's fee \$300)

WRC-2

Credit available (G or UG, 3 quarter hours)

A thorough study of the geologic development of the Yellowstone caldera and the nature and occurrence of hot springs, geysers, and mudpots will be the aim of this class. Lecture topics will include volcanic rocks, rocks of Yellowstone, geology of geothermal features, chemistry of thermal waters, and the interaction of rocks with hot waters. Field trips will take the class to many of the famous areas of the Park, including the Grand Canyon and Geyser Basins, and to unusual features that are off the beaten path. The class will have special appeal for teachers of earth science and others with serious interest. A background knowledge of geology will help in understanding many of the topics. (Class will not meet on July 4.)

Duncan Foley, Ph.D., is a geologist and project manager at the University of Utah Research Institute in Salt Lake City. For the past eight years, he has been involved with the geology and geochemistry of geothermal systems throughout the western and central U.S., including Yellowstone. He teaches environmental geology at the University of Utah.

Roy Mink, Ph.D., is a senior hydrologist with Morrison-Knudsen Engineers in Boise, Idaho. He has extensive experience in geothermal systems, was formerly chief of the geothermal energy branch of the U.S. Department of Energy at Idaho Falls, and has worked on national geothermal programs with the DOE.

Clay Nichols, Ph.D., is deputy assistant manager for Projects and Energy Programs at the Idaho Falls office of the Department of Energy where he manages programs at the Idaho National Engineering Laboratory and many universities. He has also worked on national geothermal programs for the DOE and has been a seasonal naturalist in Yellowstone.

The First People and Yellowstone

July 5-6

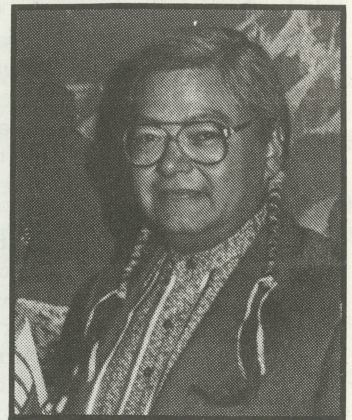
\$65 (Member's fee \$55)

WRC-1

The class theme will be Indians and the Yellowstone area. Topics to be addressed will include tribal origins, migrations, territories, treaties, interrelationships with whites, and regional incidents. Attitudes and folklore concerning the land and animals common in Yellowstone

will be explored, and a workshop on traditional art, craft skills, music, and dance will be offered as an optional activity.

George P. Horse Capture was born on the Fort Belknap Indian Reservation. He was assistant professor of Native American Studies at Montana State University before becoming curator of the Plains Indian Museum at the Buffalo Bill Historical Center in Cody, Wyoming. He has developed a tribal dictionary, produced a documentary titled I'd Rather be Powwowing for the Corporation for Public Broadcasting, and edited a number of books including Design Symbolism and Decoration, Indian Feathers, and The Seven Visions of Bull Lodge.



(Photo courtesy of
Buffalo Bill
Historical Center)

Learning Outdoor Photography

July 11-14

\$140 (Member's fee \$130)

WRC-2

This course is geared to those who want to develop their skills in outdoor photography. No previous photography experience is necessary. The course will provide instruction on all aspects of the use of the camera, proper exposure, composition, and uses of tripods and wide angle, telephoto, and close-up lenses. Special emphasis will be given to seeing and interpreting a variety of Yellowstone subjects including wildflowers, water scenes, landscapes and wildlife. The majority of the time will be spent in the field.

Pete Houdeshel's photographic prints have been featured in galleries in over 25 cities across the nation and his clients include Hallmark cards, Marriott Hotels, Aloha Magazine, Hyatt Regency Hotels, Guest Information and others. He worked for ten years for the award-winning New Worlds Magazine and has a special interest in discovering how to present scenes with imagination and clarity. Pete flies jets for Western Airlines when he is not out with a camera.



Wildflowers of Yellowstone

July 12-13 (Lamar Valley) First Session
July 15-16 (Canyon Village) Second Session
\$65 per 2-day session (Member's fee \$55)

WRC-1

Interested persons may enroll for either or both of these sessions. Field identification of the wildflowers, trees, and shrubs of Yellowstone will be emphasized in both of these short courses. Plant ecology, wildflower photography, edible plants and other topics will be discussed depending on the interests of the participants. Slide talks and group discussions will be optional evening activities.

The first course will be based at the Yellowstone Institute facility in the Lamar Valley. The first day will consist of short hikes along Rose Creek and Trout Lake. The second day a long hike will be enjoyed among the alpine meadows from Island Lake to Beartooth Lake.

The second course will begin at Canyon Village. Day number one will be devoted to short botanical hikes through the meadows and forests near Canyon. The second day will be spent among the mountain wildflowers on the slopes of Mt. Washburn. (Note: Canyon Village will be class headquarters for the night of July 15. Early lodging reservations are essential. Write or call immediately for Institute assistance. Fee does not include lodging.)

Wayne Phillips has a degree in forestry and is a range management specialist with the U.S. Forest Service on the Lewis and Clark National Forest in Great Falls, Montana. He has taught plant identification for the College of Great Falls, is intimately familiar with the vegetation of the mountain West, and has authored several botanical articles. Phillips is an avid wildflower photographer.

Small Mammals of Yellowstone

July 14-17

\$140 (Member's fee \$130)

WRC-2

Credit available (G or UG, 1 semester hour or 2 quarter hours)

This course will emphasize identification, ecological role and factors affecting the distribution and abundance of small mammals in the Yellowstone ecosystem. Predators of small mammals, their predation techniques and life history will also be studied. Field work will include identification of small mammals and their "sign" as well as live trapping and census techniques. Small mammal and predator behavior will be observed and studied systematically with emphasis on methods of observing and interpreting behavior.

Donald P. Streubel, holds a Doctor of Arts degree, and is an associate professor of biology at Idaho State University. His teaching experience includes courses in zoology, mammalogy, ornithology, wildlife management and science education. Before receiving his doctorate he was a wildlife manager and instructor in Wisconsin. His research interests include ground squirrel behavior and ecology. He has taught courses for the National Audubon Society and conducts environmental education workshops for teachers.

Backcountry Photography

July 15-19 Yellowstone Lake trip
August 4-8 Absaroka Range trip
\$280 per course (Member's fee \$265)

WRC-2

Each of these courses will cover all of the subject matter in "Wildlife Photography" (page 6) but will take place in

backcountry settings. The group will spend five days and four nights in remote, backcountry locations shooting infrequently viewed scenes. Each outing will involve moderate hiking with light packs. Group equipment, food, and other heavy items will be moved by camp outfitters.

The July trip will be in an area along the southeast shore of Yellowstone Lake. Transportation by charter boat to a drop-off site will be provided.

For the August trip, camp gear will be taken by a horsepacker to a wilderness campsite near the northeast park boundary. Participants will accompany the instructor on a moderate 5-6 mile hike to the site.

Each person must provide sleeping bag, pad, and pack. Fee includes group equipment and food.

Tom McBride (See write-up under "Wildlife Photography").

Mountain Medicine: The Wild Herbs of Yellowstone Country

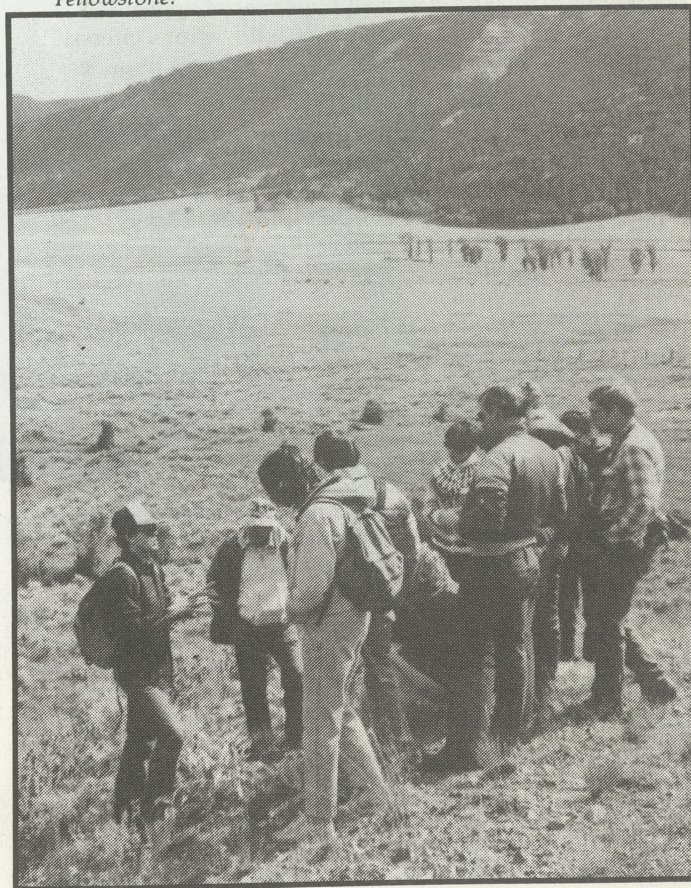
July 18-20

\$105 (Members fee \$95)

WRC-1½

Native American and early pioneer use of medicinal plants will be a central theme of this course which will also cover identification techniques, plants poisonous to humans and livestock, healing properties of medicinal herbs, and emergency uses of wild plants. The instructor has studied with Native Americans in Montana and is intimately familiar with the vegetation of the mountain West. Outings will be an integral part of the course. Medicinal herbs will be gathered and prepared by participants during a one-day field trip outside the park.

Wayne Phillips, see write-up under "Wildflowers of Yellowstone."



Wilderness Horsepacking

July 18-22 Exploring the Old Faithful-Bechler Trail

July 23-27 The Nez Perce Trail

August 17-21 The Washburn Expedition Trail

\$345 per session (Member's fee \$330) WRC-2

In addition to the historical themes, each course will stress low-impact use of pack stock in the backcountry. In addition to instruction in the use and care of pack and riding horses, participants will also learn how to camp and travel in the wilderness without damaging the fragile country. *Fee includes horses, special equipment and food. Participants must provide their own sleeping bags.*

The first course takes place in the seldom traveled Bechler Canyon country between Old Faithful and the southwest corner of the park.

The second course will explore the probable route taken in August 1877 by Nez Perce Indians while pursued by the U.S. Army. To this day their route through one of Yellowstone's most remote areas is unknown. It was wild and rugged then and remains so today.

The third course will follow a portion of the original Washburn Expedition trail along the east and south shores of Yellowstone Lake through country that is still much as it was in 1870 when Washburn's party rode through it.

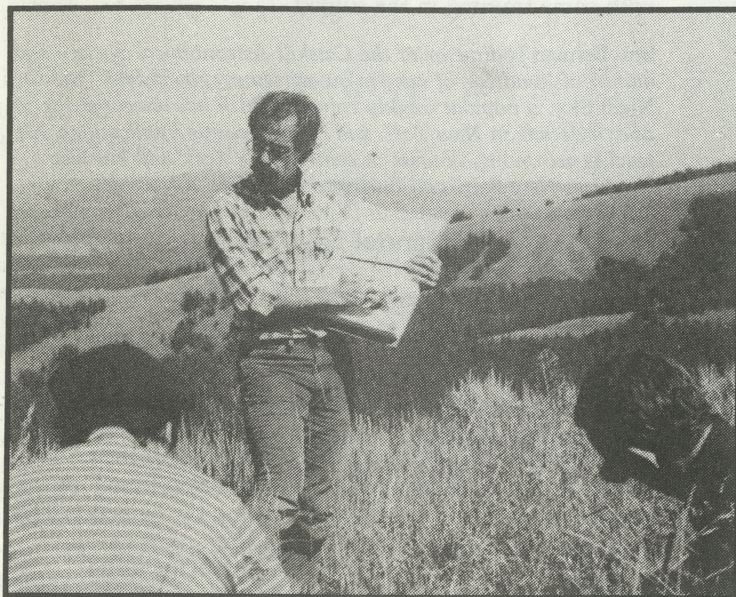
Richard Clark, Ph.D., is a native of the upper Snake River Valley and has spent twelve years as a professional guide and outfitter in the Tetons and Yellowstone. He is a faculty member at Ricks College in Rexburg, Idaho. His wealth of outdoor experience has been augmented with academic preparation in biology and botany at Utah State University, the University of Oregon, and Brigham Young University.

Wolves of Yellowstone: The Missing Link

July 19-20

\$65 (Member's fee \$55) WRC-1

This course will focus on the wolf as the major missing link in the Yellowstone ecosystem. The ecological role of the wolf as a major predator of large ungulates will be examined as will the historical and present status of wolves and their habitat in the park. The course will also explore



(photo by Royce Ball)

the issues, options and strategies associated with restoration of wolves to Yellowstone.

John Weaver is national grizzly bear habitat coordinator for the U.S.D.A. Forest Service in Missoula, Montana. He holds graduate and undergraduate degrees in Wildlife Science and has published scientific papers on wolves including a major treatise on "The Wolves of Yellowstone." He is a member of the Northern Rocky Mountain Wolf Recovery Team.

Interpreting Yellowstone with "Ranger Ted"

July 21-22 (optional extra day on 23rd)

August 4-5 (optional extra day on 6th)

\$65 per session (Member's fee \$55)

WRC-1½

Credit available (UG, 1 semester hour)

Participants in this course will join the instructor in five different environmental education nature walks and programs. Special themes which will be developed include the kinship and interdependence of all life, predator-prey relationships, and wilderness ecosystems. Educational goals and techniques will be discussed and demonstrated, and participants will learn first-hand how to provide effective field instruction for children. The course will be especially appropriate for teachers of kindergarten through eighth grade. Children of course participants are welcome to attend the nature walks for no charge, but the total group size will be limited to forty and children's places will be allotted on a first-come basis. Advance registration is suggested. (When registering, please note if you want to sign up for the additional day. This will be a day hike to Avalanche Peak and will cost an additional \$25.)

(Note: This class will meet in the Fishing Bridge area. Information about group camping and lodging will be sent to registrants.)

Ted J. Parkinson has served 37 seasons as a ranger-naturalist in Yellowstone and has delighted countless thousands of children with his informative and inspiring nature walks. As a special faculty member at Brigham Young University, Ted has taught environmental biology and natural history. He is the author of the "Ranger Red" conservation programs which have been presented throughout the schools of northern Utah.

Man should not wander as a stranger on the silent
land,
Nor under the wide sky move indifferent to the wind.
A tree,
A river,
A bird should be as extensions of himself.
Written in rocks and in the ways of wild things,
Spoken in parables of water,
Told in the gift of sunlight is the code of man's
existence
And the design for his survival...
For the earth is home and the ways of nature are truth.

by Dave Dame, Chief of Interpretation
and Visitor Services, NPS

Fire, Ice and Fossil Forests

July 21-23

\$105 (Member's fee \$95)

WRC-1½

This course will introduce participants to the unique petrified forests of Yellowstone and to the Ice Age history of the park. There will be a discussion of the theory that repeated episodes of volcanic activity buried living forests in ash and mudflows, and mineral-bearing hot water slowly petrified them. Moving to the last two million years, discussion will focus on the glacial ice and volcanic explosions. The first day of the course will involve a field trip to observe and discuss the volcanic history of Yellowstone and the Absaroka and Beartooth Mountains. The second day will be devoted to an all-day hike on Specimen Ridge. The third day includes a hike up Mt.



(photo by Royce Ball)

associate of the Institute of Arctic and Alpine Research. He is the author of a major book about mammal tracking. His major interests are mammalogy, winter, extreme environment and long-term ecology, and natural history. He has taught for fifteen years in the greater Yellowstone ecosystem.

Horsepacking: The Nez Perce Trail

July 23-27

(See description on page 9)

Yellowstone's Night Skies

July 24-27

\$135 (Member's fee \$125)

WRC-2

Participants in this course will explore the wonders of the universe from the unspoiled skies of Yellowstone. During the four days and three nights of the course, topics covered will include constellation and star study, telling time by the sun and moon, planets, birth and death of stars, fundamental understanding of such concepts as Einstein's Theory of Relativity, and black holes. In addition to outdoor observation, instructional techniques will include color slides and movies (including footage from space) plus lecture and discussion sessions. Some equipment will be provided but participants who have binoculars or small telescopes are encouraged to bring them.

This course is designed for people with no previous astronomy knowledge but will also be enjoyed by those with some training in the subject.

Bob Berman is director of the Catskill Astronomical Society and author of hundreds of articles on astronomy, including *The Night Sky*, a popular weekly column which has appeared for over a decade in *New York and Massachusetts Publications*. He teaches astronomy courses in central New York and has also taught at New Paltz and Burlington Colleges in Vermont.

Aesthetics in the Natural Environment

July 25-28

\$160 (Member's fee \$150)

WRC-2

This course will explore the relationship between two seemingly disparate aspects of American culture; an appreciation of natural systems (including wildlands and wildlife) and the development of a uniquely American musical experience—jazz and blues, a musical form that relies heavily on spontaneous improvisation based on the feelings, mood, and the physical setting of the artist. This course will engage students in a greater appreciation of both through performances by the instructor using various saxophones and through the active participation of the class using voice, hand drums, and simple wind in-



Washburn where glacial and volcanic phenomena are visually united.

John Good was chief naturalist of Yellowstone National Park for six years. During his distinguished career in the National Park Service he has served as superintendent of Acadia and Everglades National Parks and assistant superintendent of Yosemite. He holds a masters degree in geology and is a fellow of the Geological Society of America.

Mammal Tracking: Interpreting Tracks, Scat, and Other Sign

July 21-24

\$155 (Member's fee \$145)

WRC-2

Credit available (UG, 2 quarter hours)

Mammals are elusive in the wild and much of what is learned about them must come from the ability to detect and read their sign. Lectures and laboratories will provide the background for tracking field trips. Topics include tracks, gaits, trails, scat, hair, skulls, bones, teeth, chewings, scent markings, owl pellet surveys, and reading stories from the clues. As a naturalist, each student will keep a field notebook.

Jim Halfpenny, Ph.D., is coordinator of the University of Colorado Long-Term Ecological Research Program and a research



(photo courtesy of Wilbur Rehmann)

struments such as kazoos and penny whistles.

The first day will be at Lamar where the class will discuss aesthetics and the history of jazz, delve into some of the connections between aesthetics and the natural environment, and listen to both live and recorded music. The next three days and two nights will be spent in a remote backcountry location which will be reached by charter boat. Participants must provide their own food and camping equipment. A musical background is not necessary for enrollment in the course.

NOTE: See write-up on Advanced Aesthetics on page 12.

Wilbur Rehmann is the former executive director of the Montana Wildlife Federation and has been actively involved in conservation in the West. He is currently the environment and natural resource program manager for the Northern Rockies Action Resource Group. He is a professional jazz musician who has performed with Dizzy Gillespie, Arnett Cobb, Jack Walrath, Cheap Cologne, and the Big Sky Mudflaps.

Geysers, Mudpots, and Hot Springs

July 28-30

\$95 (Member's fee \$85)

The rare, spectacular geothermal features of Yellowstone will be explored in this course. After a short introduction, visits to mudpots, hot springs, and geysers will begin with hikes timed to see several of the less common geysers erupt. The class will meet at the Grand Canyon at noon on Tuesday and then proceed to the Old Faithful area for a full day of geyser gazing on Wednesday. Norris Geyser Basin and other sites will be visited on Thursday, and class will end in early afternoon. No background in geology is required. (This class will headquarter at Old Faithful. Early lodging reservations are essential. Contact the Institute office for assistance. Fee does not include lodging.)

(Note: See schedule tie-in with children's class, "Three Days at the Buffalo Ranch," July 28-30.)

Duncan Foley, see write-up under "Hydrothermal Systems."

Three Days at the Buffalo Ranch (Ages 8-12)

July 28-30 First Session

August 1-3 Second Session

\$95 per session (Member's fee \$85)

Limit: 20

This three-day stay at the Lamar Buffalo Ranch is especially for children 8-12 years old. It provides an exciting time for youngsters to learn and explore in a national park and make new friends. Each day includes a hike during which children observe wildlife and learn about plants, ecology, and the park's history. Afternoons at the ranch are devoted to supervised art projects such as making masks, books, murals, clay sculptures and t-shirts. Active days of fun and learning are concluded each evening with games, songs, and wildlife films. *Fee includes meals and lodging. Children must provide their own sleeping bags, canteens, and day packs.*

Parent's Note: Two classes for adults have been scheduled to partially coincide with the children's courses to give parents a class option. See write ups for "Geysers, Mudpots, and Hot Springs," July 28-30 and "Artists in Yellowstone," August 1-2.

Laura Mendelsohn teaches in the Yellowstone National Park School and serves as a consultant for NPS school field programs. Her background includes extensive experience in outdoor education in Alaska with the U.S. Forest Service.

Cynthia L. Andrus has a degree in elementary education with science as her field. She is a year-round participant in outdoor sports and has certifications in advanced first-aid, lifesaving, campcraft, and nature interpretation.

Louise Bruce has a degree in recreation management and is a year-round resident of Yellowstone Park. She has extensive experience in outdoor and environmental education through work with nature centers, schools, and camps in Montana, California, and Colorado and at Yellowstone and Grand Canyon National Parks.

Fred Donaldson has a Ph.D. in geography and has taught at all grade levels including wilderness courses for youngsters. He is also the Institute's instructor for a course titled "The Ways of the Mountain Men."



Advanced Yellowstone Aesthetics

July 30 - August 1

\$135 (Members fee \$125)

WRC-1½

The relationship between the natural environment and human creative processes will be examined in this course while encamped in the backcountry on Yellowstone Lake. Creativity as affected by mood, emotion, and place will be the central theme. The course is recommended for previous attendees of "Aesthetics and the Natural Environment" or persons actively pursuing their own creative endeavors in fields such as painting, music, writing, dance, and drama. Participation by creating will be each person's goal. The group will cross Yellowstone Lake via charter boat on the morning of July 30. Enrollees must provide their own food and camping gear.

Wilbur Rehmman, see write-up under "Aesthetics."

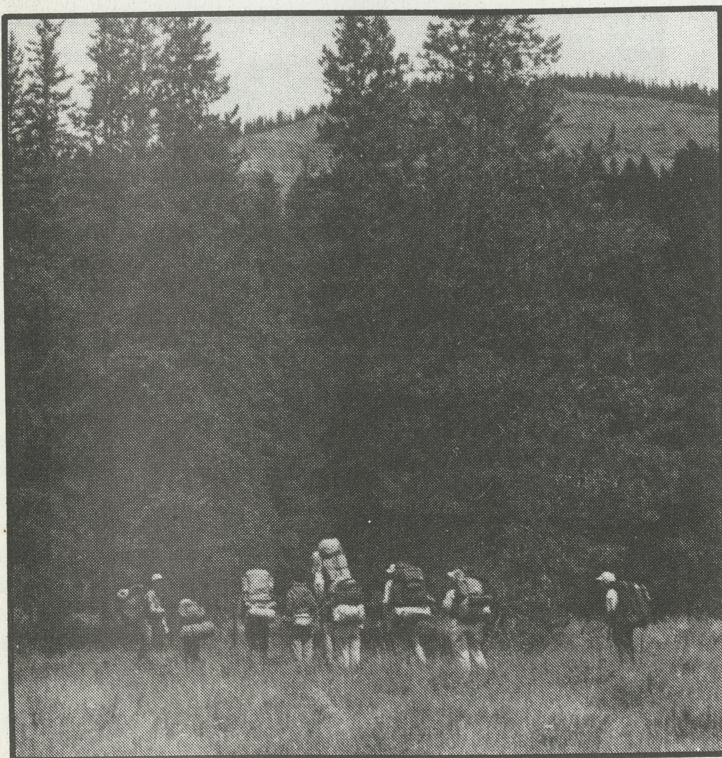
Wilderness Hiking and Camping in Grizzly Country

July 31 - August 1

\$65 (Member's fee \$55)

Moderate hikes of 5-6 miles each day and an overnight in the Yellowstone backcountry will provide the format for this class which will emphasize safety and precautions necessary in grizzly country. The first morning of this course will be devoted to a discussion of the history of bear-man confrontations in the national parks followed by a discussion of techniques for the prevention of such confrontations including some suggestions for dealing with grizzly encounters. The remainder of the weekend will cover camping techniques and further discussion about the current status of the great bear and its uncertain future. Participants must provide their own backpacking gear and food.

Bill Schneider has authored *Where the Grizzly Walks*, *The Hiker's Guide to Montana* and two dozen feature articles on grizzlies including recent articles in *Backpacker* and *Montana*



Magazine. He has a degree in wildlife biology and was editor of the *Montana Department Fish, Wildlife and Parks' Montana Outdoors* for nine years. He is currently editor of *Wild America*, published by the American Wilderness Alliance.

Artists in Yellowstone

August 1-2

\$65 (Member's fee \$55)

WRC-1

The course will survey 19th and early 20th century American painting with special focus on the artists who visited and observed the Yellowstone area. The instructor will review the developing aesthetic perceptions of nature and how Yellowstone, with its array of natural wonders, was perceived in the public mind. In addition to slide-illustrated lectures, the class will feature field trips to view



scenic locations which inspired works of art.

Mammoth Hotel will be class headquarters for the night of August 1. Early lodging reservations are essential. Write or call immediately for Institute assistance. Fee does not include lodging. (See schedule tie-in with children's class, "Three Days at the Buffalo Ranch," August 1-3.)

Peter H. Hassrick has written numerous books and exhibition catalogs on artists and art history of the American West including *The Rocky Mountains: A Vision for Artists in the Nineteenth Century*, *The Way West: Art of Frontier America*, and *Treasures of the Old West*. For the past nine years he has served as the director of the Buffalo Bill Historical Center in Cody, Wyoming.

Three Days at the Buffalo Ranch
August 1-3

(Ages 8-12)
(See description on page 11)

Interpreting Yellowstone with "Ranger Ted"
August 4-5

(See description on page 9)

Backcountry Photography
August 4-8

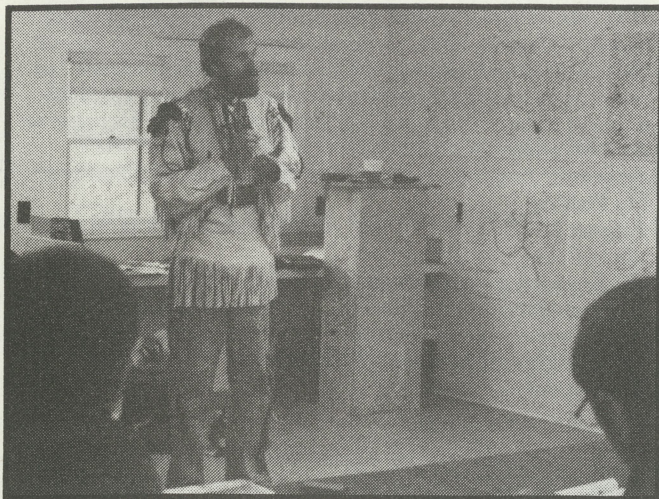
(See description on page 8)

The Ways of the Mountain Men
August 4-6

\$105 (Member's fee \$95)

WRC-1½

Survival for the early trappers and mountain men of the Rocky Mountain West depended upon their skills as a hunter, trapper, craftsman, botanist, cook, meteorologist,



diplomat and psychologist. This course will introduce participants to the "Old Ways" of the mountain men. Demonstration, field work and discussion will be utilized to help participants develop an understanding and appreciation of the skills, crafts, tools and social psychology of these remarkable pioneers.

Fred Donaldson has a Ph.D. in geography and has taught a wide variety of courses on Native American studies, beading and tanning, tracking and stalking, and environmental education. He has authored articles on the mountain men and is a member of the Beartooth Mountain Men.

Women and Wilderness

August 7-8 Session I: An Introduction

August 9-10 Session II: Overnight Backpacking Trip
\$65 per 2-day session (Member's fee \$55) WRC-1½

Interested women may enroll for either or both of these two-day sessions.

The first session is for women of all backgrounds including those with little or no previous outdoor experience and will provide an introduction to the basic practical skills for wilderness travel and camping. Moderate day hikes will incorporate information about the flora and fauna of the Yellowstone ecosystem, discussions of psychological and physical conditioning for wilderness travel, and an emphasis on low impact camping techniques.

The second session is designed either as a follow-up to the first session or for more experienced hikers who want to learn the essentials of backpacking: how to pack, food selection, checklists, hazards, and low impact techniques. The overnight trip will provide an opportunity for practical applications and to pursue discussion of topics related to women and wilderness. Participants must provide their own backpacking gear and food.

Fay Shultz Johnson is an outdoor enthusiast with a degree in physical geography. She serves on the Professional Ski Patrol at Bridger Bowl near Bozeman, Montana, and was formerly an Outward Bound instructor in New Mexico.

Fly Fishing the Catch-and-Release Way

August 8-10 less experienced

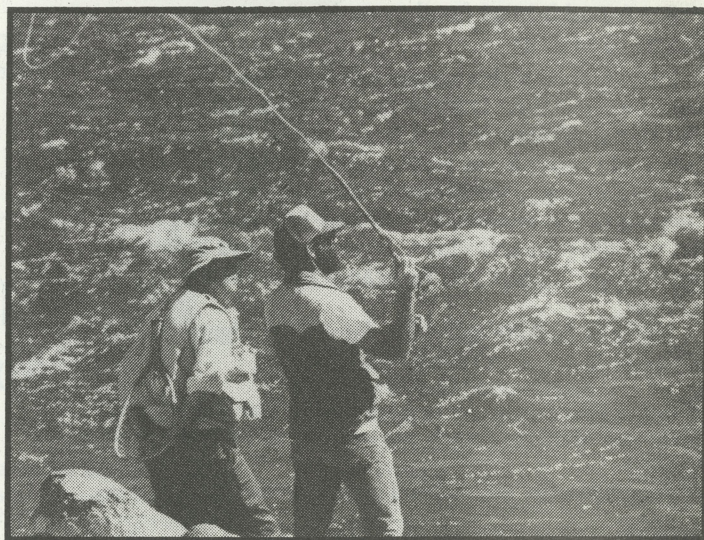
August 15-17 more experienced
\$125 (Member's fee \$115)

Both sessions of this course will emphasize the special nature of Yellowstone fishing—its abundance of native fish and the special regulations and fishing philosophies

which have enabled park managers to protect and maintain a sport fishing resource. The course for less experienced persons will concentrate on the basics and is intended for those who have progressed far enough to purchase their own equipment but who have not spent much time actually fly fishing. About half the course time in this first session will be spent away from the water practicing casting and other techniques. During the second and third days, the instructor will work with half of the group each day on the stream. He will be available each evening for discussion.

The session for the more experienced is for persons who have mastered the basics and will focus almost exclusively on fishing Yellowstone's waters. The instructor will act primarily as a resource person in assisting participants in polishing their skills. Most instruction will be on an individual basis or in small groups. Both courses are limited to twelve persons. The instructor will work intensively with four persons each day. During the other two days of each course, instruction will be limited to morning and evening discussions.

Richard Parks is the manager of Parks' Fly Shop, a family business that has been in Montana for over thirty years. Richard is highly respected as a fly tier, a teacher and a river guide and is intimately familiar with Yellowstone's waters.



Star Trails West

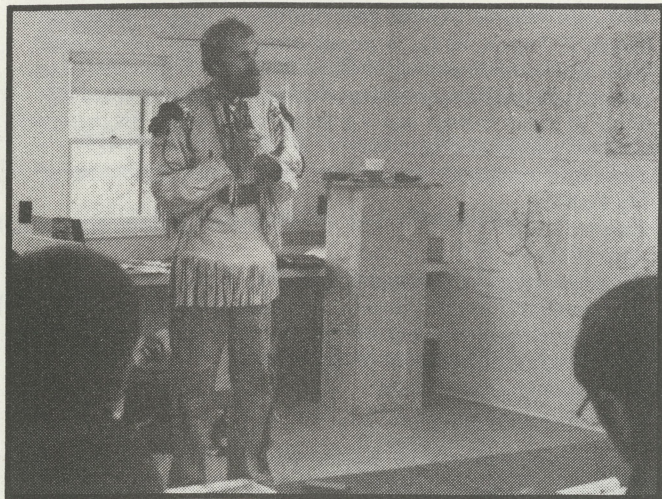
August 10-12

\$65 (Member's fee \$55)

WRC-1½

This class will study early explorations of the West and the use of astronomy for navigation and map making. Emphasis will be given also to Native American astronomy and sky mythology and to the history of early American astronomy. Discussion will be augmented by two nights of observation in the clear, dark skies of Lamar Valley, from a location on the old Bannock trail through Yellowstone. The class begins in the afternoon of August 10 and concludes at noon 12th.

Robert C. Hoyle has taught astronomy and servatory director at Lenoir Rhyne College and as a visiting lecturer at the University of Yellowstone Association has trained Park Service personnel in Native American sky mythology program for Planetarium.



diplomat and psychologist. This course will introduce participants to the "Old Ways" of the mountain men. Demonstration, field work and discussion will be utilized to help participants develop an understanding and appreciation of the skills, crafts, tools and social psychology of these remarkable pioneers.

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Fay Shultz Johnson is an outdoor enthusiast with a degree in physical geography. She serves on the Professional Ski Patrol at Bridger Bowl near Bozeman, Montana, and was formerly an Outward Bound instructor in New Mexico.

Fly Fishing the Catch-and-Release Way

August 8-10 less experienced

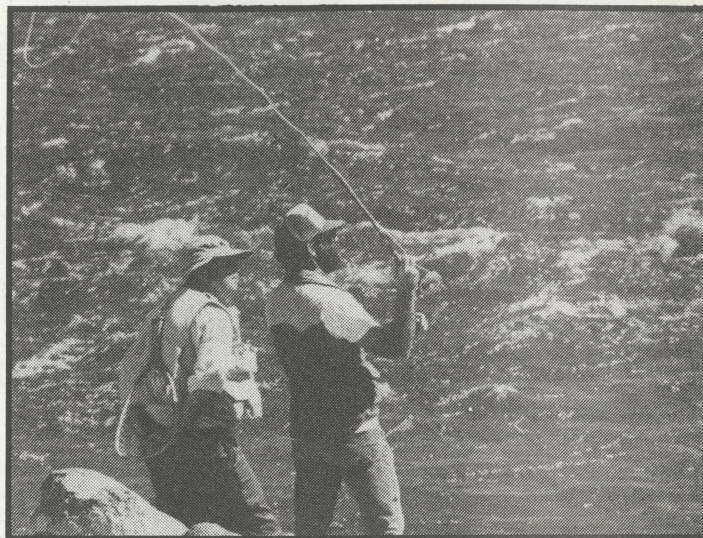
August 15-17 more experienced
\$125 (Member's fee \$115)

Both sessions of this course will emphasize the special nature of Yellowstone fishing—its abundance of native fish and the special regulations and fishing philosophies

which have enabled park managers to protect and maintain a sport fishing resource. The course for less experienced persons will concentrate on the basics and is intended for those who have progressed far enough to purchase their own equipment but who have not spent much time actually fly fishing. About half the course time in this first session will be spent away from the water practicing casting and other techniques. During the second and third days, the instructor will work with half of the group each day on the stream. He will be available each evening for discussion.

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Richard Parks is the manager of Parks' Fly Shop, a family business that has been in Montana for over thirty years. Richard is highly respected as a fly tier, a teacher and a river guide and is intimately familiar with Yellowstone's waters.



Star Trails West

August 10-12

\$65 (Member's fee \$55)

WRC-1½

This class will study early explorations of the West and the use of astronomy for navigation and map making. Emphasis will be given also to Native American astronomy and sky mythology and to the history of early American astronomy. Discussion will be augmented by two nights of observation in the clear, dark skies of the Lamar Valley, from a location on the old Bannock Indian trail through Yellowstone. The class begins in the late afternoon of August 10 and concludes at noon on the 12th.

Robert C. Hoyle has taught astronomy and served as observatory director at Lenoir Rhyne College and Catawba College and as a visiting lecturer at the University of North Carolina. He has trained Park Service personnel in Native American sky interpretation and is the author of "Watchers of the Sky," a Native American sky mythology program produced by Morehead Planetarium.

The Bison of Yellowstone

August 11-12

\$65 (Member's fee \$55)

WRC-1

Two days of field and classroom study will be devoted to this powerful symbol of the American West. Included will be evolutionary history, distribution, ecological relationships, identification of sex and age groups, interspecific relationships, sign, the Yellowstone population in the context of the bison's general history, and management problems. The course is scheduled during the bison's rut to enhance the study of mating behavior, field identification by sex and age, and population regulation.

Mary Meagher has worked in Yellowstone since 1959. Her research on bison began in 1963. She has a Ph.D. in wildlife ecology from the University of California, Berkeley, and is the author of *The Bison of Yellowstone National Park*, a park service scientific monograph. She served as the park's supervising biologist from 1976 to 1983 and has now returned to fulltime research.

Family Days at the Buffalo Ranch

August 13-14

\$65 for one parent and one child plus \$20 for each additional family member (Member's fee \$55 plus \$15 for additional family members)

Limit: 10 families

Participants in this course will join three Institute instructors and their families for two days and nights at the old Buffalo Ranch in the Lamar Valley. Moderate day hikes will provide the format for introductions to subjects such as geology, wildflowers, nature photography, bear behavior, and aesthetics. Evenings will feature programs on wildlife film and video, astronomy, and Indian sky mythology. Topics will be geared for a variety of age groups.

Fee includes one cabin per family for nights of August 12 and 13.

Bob and Blair Hoyle, see write-up under "Star Trails West."
Steve and Marilyn French, see write-up under "Wilderness Images."

Wilbur Rehmann, see write-up under "Aesthetics."

Wilderness Images: Telling the Story with Film and Video

August 15-17

\$105 (Member's fee \$95)

WRC-1½

This course will give emphasis to obtaining good results, both in terms of image quality and validity of behavior or scenes recorded, and to telling a complete story. Topics include sequence shooting, developing themes, script writing, notes on animal behavior, choice locales, technical tips, equipment, critiques of existing films, and editing. The ethics of wildlife film making and the mutual advantages of a nonintrusive approach will also be addressed. Classwork will include a field assignment followed by a session to analyze, edit, and plan toward a final, complete film or tape story. Participants will need to bring video or movie equipment.

Bob Landis is a professional cinematographer whose wildlife scenes have appeared on CBS and BBC specials, *New Wilderness*, and *Wild America*. His film *Song Dog*, about coyotes in the Lamar Valley, was a multiple award winner at the

1985 International Wildlife Film Festival.

Steven P. French, M.D., is an advanced amateur who logged some 800 hours in pursuit of video images in Yellowstone last summer. His 101 bear sightings during the season yielded 22 hours of video footage and a growing demand for his presentations on grizzly bear activities.

Fly Fishing

August 15-17

(See description on page 13)

Horsepacking: Washburn Expedition Trail

August 17-21

(See description on page 9)

Bald Eagles of Greater Yellowstone

August 29

\$10 (Member's fee \$5)

This program will be a joint effort with the Bald Eagle Working Group for the Greater Yellowstone Ecosystem. Included will be a field trip to a nesting site plus discussion of nesting behavior, population trends, and research methods. Presentations will also cover bald eagle biology, habitat status, management, threats to recovery, banding programs, and a summary of the Bald Eagle Working Group's latest research reports.

Program schedules will be mailed to registrants at least 4 weeks prior to the seminar date. The location will be determined by the number of preregistrations.

Included among the speakers will be Bald Eagle Working Group members Bob Oakleaf, Bob Jones, and Al Harmata. Oakleaf is a non-game bird biologist for the State of Wyoming and a member of the National Recovery Team. Jones is a wildlife biologist for the BLM Medicine Lodge Resource Area with seven years experience in all aspects of bald eagle management. Harmata, a raptor biologist, eagle specialist, is an adjunct assistant professor at Montana State University involved with current research on bald eagles of the Yellowstone ecosystem.

Women and the Natural World

August 30-31

\$65 (Member's fee \$55)

WRC-1

While exploring and hiking in Yellowstone's Lamar Valley, participants in this seminar will discuss current and historical writings by and about women involved with nature and wilderness. Topics to be emphasized include women in Yellowstone's history, famous women in outdoor-related fields (such as mountaineering, field sciences, and conservation) and women natural history writers. Participants will be encouraged to bring excerpts from books and magazines, and to offer their own experiences for group discussion.

Laura Mendelsohn will serve as seminar leader. She has worked on wilderness trail crews, as a biological researcher, as a forestry technician, and as leader of environmental education and conservation programs for the Youth Conservation Corps in Alaska. She currently lives and teaches in Yellowstone National Park.

Yellowstone Facts

The boundaries of Yellowstone National Park enclose a total of 2,221,776 acres, over 95% of which is still backcountry.

Visitation in 1985 totaled 2,262,455 compared to 2,262,969 recorded for 1984.

The Act of Congress which created the park on March 1, 1872 never referred to it by name. The phrase "Yellowstone National Park" was first applied to the huge public park in written correspondence between the first superintendent, Nathaniel P. Langford and Secretary of Interior Columbus Delano.

NEEDS LIST

Among the several thousand readers of this brochure are some who may be able to easily help acquire certain needed items for the Institute classes.

Below is a description of a few such objects. Anyone who has a surplus item or a suggestion regarding a possible source is invited to contact the director's office.

Gifts are, of course, tax deductible.

two 6 to 8 ft. chalkboards, portable or on rolling stands
blackout curtains or shades for classrooms
large color TV monitor for VCR (or standard color set)
16mm movie projector, sound
Micro computer, monitor, printer, word processing and
bookkeeping programs, disk drives
3-5 hp outboard motor
¾ inch VCR
Kodak Carousel slide projector
zoom lens for Kodak slide projector
vehicle for book deliveries (cargo van, "Suburban," etc.)
passenger van (12-15 people, two)
35 mm and 2¼ camera outfits
folding classroom tables (4-6)
classroom chairs (stackable arm chairs, two dozen)
outdoor tables (3-4)
spotting scopes (2-4)
astronomical telescopes (1-2)
sturdy tripods (2-4)
dissecting microscopes, stereo (2-3)
paper cutters (one large, one small)
two-way radios (2)
micro-film reader

The Yellowstone Association was founded in 1933 to assist with educational, historical, and scientific programs for the benefit of Yellowstone National Park and its visitors. Among the Association's past and present projects are the following:

- * Donated research library to park in 1967 and provides continued support through purchase of books and periodicals and hiring of part-time librarians
- * Operates book sales outlets in Visitor Centers throughout the park
- * Founded The Yellowstone Institute in 1976 and serves as its sponsoring organization
- * Publishes trail guides for self-tours of thermal areas
- * Publishes books and pamphlets pertaining to Yellowstone
- * Assists naturalists with visitor information services at Visitor Centers
- * Prints schedules of naturalist programs for visitors
- * Administers grants and gifts received for designated projects in Yellowstone
- * Funded Yellowstone's first braille trail
- * Contributed funds for museum exhibits and research equipment

The Yellowstone Association for Natural Science, History and Education, Inc. is a non-profit, tax-exempt organization.

Membership Benefits

The principal reason for contributing to any organization is to demonstrate interest and support. For Yellowstone Associates there are benefits provided as acknowledgment of that interest and support.

- * Discounts on class fees
- * A 15% discount on books sold by The Yellowstone Association (in Visitor Centers or by mail)
- * An informative newsletter
- * Discounts on Institute products
- * Institute course information sent by First Class Mail
- * Invitations to special activities
- * A family membership covering donor, spouse, and children through age 20
- * Opportunity to support scientific, educational and historical programs in Yellowstone National Park
- * Association with other individuals with similar interests
- * A tax deduction
- * Discounts at many association bookstores in other national parks.

MEMBERSHIP FORM

Please enroll me as a member of The Yellowstone Association.

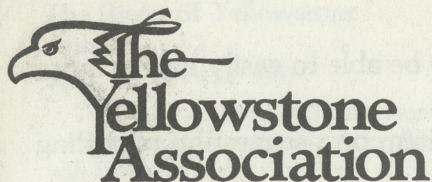
Associate\$ 25_____
Contributing 50_____
Sustaining 100_____
Patron 250_____
Sponsor 500_____
Benefactor 1000_____

Name _____
Address _____
City _____
State _____ Zip _____

Identify other family members for whom membership cards are desired

Make checks payable to
"The Yellowstone Association."
Charge to ☐ Visa ☐ MasterCard
Number _____
Expiration date _____
Signature _____

Mail
to: The Yellowstone Association
P.O. Box 117
Yellowstone National Park, WY
82190



P.O. Box 117
Yellowstone National Park, Wyoming 82190

Non-Profit Organization
U.S. POSTAGE PAID
Permit No. 104
Livingston, MT 59047

ADDRESS CORRECTION REQUESTED

Please help by sharing your
Institute Catalog with a friend.

REGISTRATION FORM

Name _____ ☐ Male ☐ Female Date _____

Address _____ ☐ Please check if this address is different from the one on the Institute mailing list.

City _____ State _____ Zip _____ Office phone _____ Home phone _____

Where can you be reached one month prior to course? Address _____ Phone _____

How did you find out about the Yellowstone Institute? _____

☐ Check here if you are an '86 member of The Yellowstone Association or are joining now. (Memberships begin at \$25 and include immediate family.)

Please enroll me in the following courses:

Course Title	Dates	Tuition Fee	Are you enrolling for academic credit?
_____	_____	_____	_____
_____	_____	_____	_____
_____	_____	_____	_____

☐ I want to stay in the Lamar cabins the following nights (give dates) at \$6 per person per night. _____

☐ My class does not meet at Lamar. See my attached note regarding need for lodging or camping reservations, dates, etc.

☐ I will make my own lodging or camping arrangements.

Release and Assumption of Risk

I am aware that during the courses that I am participating in under the arrangements of the YELLOWSTONE INSTITUTE and its agents or associates, certain risks and dangers may occur, including but not limited to the hazards of traveling in rough terrain, water, and thermal feature areas; accident or illness in areas remote from medical facilities; the forces of nature; and travel by automobile, bus, air or other conveyance. In consideration of, and as part payment for the right to participate in such courses or other activities, I have and do hereby assume the risks and all legal responsibility for injury to myself or loss of my property resulting from participation in these courses or other activities, and do hereby hold the YELLOWSTONE INSTITUTE harmless from any and all liability, actions, causes of action, debts, claims and demands which I now have or which may arise in connection with my participation in these courses or other activities. The terms hereof shall serve as release and assumption of risk for my heirs, personal representatives, executors, administrators, and for all members of my family. I affirm that my general health is good and that I am not under a doctor's care for any condition which will endanger my health or the health of other participants. In case of injury and/or illness, I will bear the cost of any evacuation procedures such as ambulance, helicopter, rescue team and professional medical care. My participation in the Yellowstone Institute course(s) and attendant activities, including photographs for future publicity in which I may appear, is entirely voluntary.

Total Tuition Fee _____

Cabin Fee at \$6 per night per person _____

Membership or donation (optional) _____

Total Enclosed _____

Charge to ☐ Visa ☐ MasterCard

Number _____

Expiration Date _____

Signature of Cardholder _____

Detach and mail to: Yellowstone Institute

Box 117

Yellowstone National Park, WY 82190

Date _____ Your Signature: _____

If under 21 years of age, parent or guardian must sign: _____

If under 21 years, give age: _____ years

☐ Inform me about winter courses.