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Desolation Canyon becoming perhaps too popular



IN GRAY CANYON the country opens up majestically.

by Joan Nice

Major John Wesley Powell gave the name "Desolation" to a canyon he explored on the Green River in 1869. He found the canyon's walls almost devoid of vegetation, except for "dwarf bushes" and "ugly clumps" of juniper growing in the crevices. In addition to the forbidding scenery, he faced an endless series of rapids and a strong, desiccating wind. Two of his boats were upset during the ordeal.

Today wilderness-seekers and whitewater enthusiasts vacation in the same canyon. The remoteness and the rapids, the very factors that tortured Powell and his party, have caused visitation to triple in the last four years. Over 6,000 people floated through it this summer.

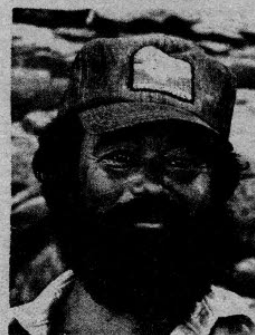
Desolation Canyon rises out of the desert at Sand Wash near Ouray, Utah, and becomes Gray Canyon two-thirds of the way downstream toward Green River, Utah. Together, the two canyons form an 80-mile stretch of wilderness that is considered the river's most pristine segment in Utah. But now river runners, bureaucrats, and Indians are faced with the choice of whether or not to keep it that way.

Dave Kloepper, owner of Harris Boat Trips, says that Desolation and Gray Canyons are his favorite stretch of river — anywhere. His company is among the canyons' approximately 30 commercial users. He is meticulous about his groups' camping techniques, doing more than federal regulations require to protect the land from too many people.

Bob Barry, an outdoor recreation planner for the Bureau of Land Management (BLM), is concerned about the growing numbers of visitors. He expects the bureau to institute a reservation system soon that will keep total level of use of the canyon about where it is now — at 30,000 user-days (number of users multiplied by the number of days they spend in the canyon). He is also recommending that BLM limit the size of groups that enter the canyon.

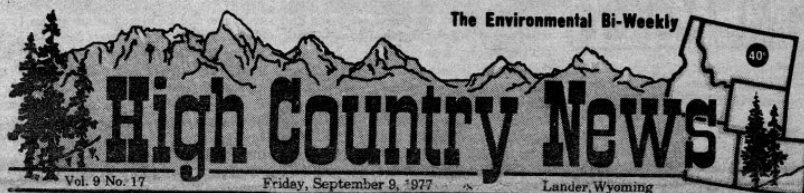
People are not the only threat to these canyons. They contain feed for stock; some mineral wealth — oil shale, oil and gas, and coal; and at least one potential dam

(continued on page 4)



DAVE KLOEPPER, owner of Harris Boat Trips, says wilderness users may have to learn to tolerate other people in their favorite places.

(continued on page 6)



In North Dakota

Firms buy out opposition

by Dan Whipple

Landowner groups' opposition to energy development in the West has been one of the strongest forces in slowing the rapid industrialization of agricultural areas. However, a North Dakota project may have found a way to quiet this opposition — buy it out.

In the spring of 1976, ANG Coal Gasification Company announced that it was slowing the timetable for development of its proposed Mercer County, N.D. gasification plant. The project was originally designed to produce 250,000 cubic feet of gas daily. The new proposal would provide for two stages of development, the first calling for a capacity of only 125,000 cubic feet daily. The gas would be produced from coal provided by North American Coal Company (NACCO) from the lignite fields that underly much of Mercer County.

Announcing the scaled-down version of the project, ANG president Arthur Seder said, "A number of factors, including inflation and procurement problems, influence this decision. But, also among the reasons were concerns about the social and economic impact of the project as expressed by Governor Arthur Link and the people of Mercer County."

The objections from the community had been vigorous. Mercer County is faced with energy development that is large even by current Western "boom town" standards. In addition to the ANG project, two coal-fired power plants are scheduled for construction in the county. One will be built by

Basin Electric Power Cooperative, which will supply the ANG plant with electricity, and the other is being constructed by a consortium of utilities from Minnesota and North and South Dakota. A study undertaken by Basin estimated that the construction and permanent work forces from the three projects would bring 8,000 new residents to the county. The current population is about 6,000.

COMMUNITY OBJECTIONS

The boom town chaos that often accompanies rapid growth concerned diverse groups of people. A petition drive was initiated to oppose the plant, and over 1,500 people signed it, or about 37% of the county's voters. The petitioners said the gasification plant threatened the lifestyle and traditional economic base in the county. Even many of the miners at North American Coal's mine in Mercer County signed the petition. They feared that the increased demand for coal would deplete the coal seam faster than scheduled, resulting in job losses for miners.

The Hazen, N.D., school board opposed the plant, fearing that the population influx would bring undue hardships to the school system.

One of the groups formed to protest the plant was the Mercer County Landowners Association. It was founded by Eugene Keller, a Beulah area farmer, and its membership consisted of several landowners who felt they would be adversely affected by the

plant's construction. In addition to fighting ANG's specific plans, the landowners opposed the whole idea of "big industry bringing pipelines, railroads, and power lines into the area," according to Keller.

It was partially because of this opposition that ANG decided to cut back on the size of the plant in its initial stages.

Now, however, despite the initial successes of the opposition, and continuing difficulties that ANG has encountered with financing and siting, citizen opposition has virtually ceased, according to Sheldon Green, a local newspaper editor. And, according to ANG's community representative in Beulah, N.D., Edsel Boe, "The people are now mentally conditioned to accept this change that's going to occur. You'll never have all the opposition quieted, but some of the vocal ones' concerns have been answered and satisfied."

One of the "vocal ones" that Boe is referring to was Beulah area farmer Joseph Walker. Walker had a 20-acre plot adjacent to the plant site. Not wanting to live "under the smokestack," Walker opposed the siting of ANG's plant in that area. He intervened in the company's application for special use permits before the Mercer County Board of Commissioners.

Walker's intervention held up progress on the applications. ANG decided to try to buy his land, and the commissioners refused to consider granting the permits

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HIGH COUNTRY

The severe drought here near Richland, Ore., and in other parts of the Northwest is beginning to make its effects felt in a personal way. We are without irrigation water and have been for a month. We have lost much of our late season garden crops and small fruits. There are cracks an inch to two inches wide in parts of our garden.

It is one of the worst dry periods experienced in this area. One old-timer says in his 53 years of having anything to do with our irrigation ditch it has never been dry before.

According to many weather experts, we may be in for more of the same. A recent article in *Popular Science* (Sept. 1977) says we may be returning to a more "normal" era of drier and colder weather. If this is true then many parts of the United States are in for trouble. Both water and energy problems may become more acute.

U.S. News & World Report (July 18, 1977) headlined an article, "Is U.S. Running Out of Water?" It begins by saying, "The prolonged drought... is raising grave concern about America's long-range water supply. So rapidly are Americans using water that even if the drought were to be broken immediately, virtually every section of the country would be confronted with serious shortages of drinkable water in the coming decades."

"Experts say that the nation's water problems may be every bit as difficult and expensive to solve as the energy crisis."

The article also says that shortages of water in rivers, lakes, and streams are not limited just to drought areas. It states, "Seventy per cent of the nation's rivers have less flow than normal."

All of this points up a problem that more and more people will have to realize and appreciate. We are running low on many of the natural resources upon which our way of life depends. Indeed, our very survival may be dependent upon our coming to grips with reality.

Energy problems continue to grow more critical. A widespread lack of water could only enlarge upon those problems. The Northwest is particularly dependent upon hydroelectric power. Yet it is already looking east to the huge coal fields of Wyoming for sources of steam-generated power.

What happens to all the steam-generated power when sources of water run low? Dams on the Green River wouldn't help the Jim Bridger Plant in southwestern Wyoming. Even the reservoirs are dry after two years of drought in the Northwest.

If you talk about Colorado River water for developing shale oil, supplying more and more steam generating plants, putting huge amounts of water into the Central Arizona and Central Utah Projects, and still supplying Los Angeles with drinking water, where are you going to find all that water?

There is hope for us amidst all this dilemma — but only if we are willing to accept profound changes in our personal lifestyles. Like those of us here in the Northwest, the changes may be forced upon us by circumstances we may not like, but cannot alter.

CORRECTION

Bart Koehler says that the number of acres of potential wilderness in the Central Rockies Area should be about 800,000 acres instead of 1.1 million acres as he estimated in an article in HCN on Aug. 12.



DUCKS are on the move as cool weather hits the high country.

Wyoming Game and Fish Department photo by LuRay Parker



HCN Letters

DISORGANIZED RARE II

Dear HCN,

I attended a U.S. Forest Service RARE II (Roadless Area Review II) meeting here last week. We learned something from it. (We only moved here a year ago and are still feeling out the community philosophies.)

The most disturbing of all the things that came out at the meeting was how disorganized RARE II is: the hearings process, the Forest Service's lack of ability to facilitate this important procedure.

Greg Meyer
Mont.

TWO OPTIONS

Editors, HCN:

In Mr. Huebner's letter in the August 12th issue of HCN, he stated "nuclear power is NOT intrinsically bad" (original emphasis).

Whether it is bad or not is personal opinion; it is a fact, however, that it is intrinsically dangerous. Even the nuclear industry for which Mr. Huebner works agrees there will be radioactive material released to the environment. The frequency and magnitude of the releases is still anybody's guess and depends to a large extent on the eventual size of the nuclear power program.

Mr. Huebner purports to have reviewed all the current information on solar and wind technologies and dismisses them as "pie-in-the-sky" technologies. Apparently he is unaware that several of the major nuclear reactor vendors do not share his pessimism and are actively engaged in research and development efforts in these areas. As a matter of fact, many of the major corporations in this country, including the major energy companies, are involved to one extent or another in solar and wind technology development. Also the Middle East oil-rich countries are not in-

vesting in solar technology simply for amusement.

In the long-term, we have only two realistic energy options: an energy system based on thousands of plutonium-fueled breeder reactors, or based on solar and wind technologies. (Nuclear fusion is a possibility but not a certainty, and even if the technology is technically feasible, there will be many problems associated with it.) The environmental, social, and economic impacts of these competing technologies must be thoroughly investigated and understood before a choice is made between the two systems. That choice should ultimately be made by society and not solely by the energy industry.

The anti-nuclear demonstrators that Mr. Huebner criticizes have as much right to make that decision as he has. They may or may not have as much technical background as Mr. Huebner has, but they may have a better perspective of all the ramifications of the nuclear option from outside the nuclear industry. Before Mr. Huebner tosses around terms like "environmental hypocrites" he should carefully examine his own prejudices and self interests.

Carl J. Hoevar
Idaho Springs, Colo.

SCIENTISTS KNOW HALF ENOUGH

Dear HCN:

Heaven protect us from such non-hypocrites as Marty Huebner (HCN Aug. 12). If the energy conglomerates could keep the environmentalists home, allowing us to attend only those meetings, hearings, and demonstrations within walking distance of our place of work while they flit around the planet in their energy guzzling jets, hatching ever grander schemes for ripping up this fragile planet for private profit, they'd have it all.

The Seabrook demonstration was an episode in the continuing battle between the energy conglomerates, whose only purpose in this world is to get the citizens hooked on an ever-increasing diet of energy and, on the other side, those public-spirited people who can look beyond the petty rewards of the moment into the not too distant future where our children will have to live.

They have the money, but we have the brains; and we have the numbers of energetic people who won't be put off by

such name-calling as Marty Huebner chooses to indulge in.

If you wish to measure the effectiveness of an environmentalist by the amount of energy he, personally, consumes, then you must put the dead at the top of the list. They use none at all. I'm not dead yet, and as long as I have the power to move, I'll do what I can to wake up the apathetic mass, especially those poor dumb clucks who think they are doing something important when they recycle their aluminum cans. Let's get it together and ban throwaway cans for a starter and go on from there.

As for nuclear power, it is intrinsically bad. Whether the intention is for military or peaceful use, the splitters of the atom manufacture radioactive matter which will remain in our environment for thousands of years. Like the sorcerer's apprentice of old, modern day scientists know only half enough. They can manufacture radioactive matter; in fact they do so with every atom they split. They cannot reverse the process. They are creating for our children and all of us a radioactive world where leukemia, atomic war, and nuclear accidents are accepted facts of life — provided life can continue to exist in such a world.

Actually, I don't know why I'm writing this particular letter, to you of all people. If you could be put off by a little finger-pointing, you'd have quit long ago.

Laverne Rison
Basin, Wyo.

HOW DID MURIE DO IT?

Dear Friends,

I enjoyed the article by Peter Wild on Olaus Murie. (Let me encourage you to continue the series — it helps to know our "roots," so to speak.) Wild mentioned briefly Murie's great ability to motivate others. How? I feel that one of the highest duties an activist must assume, is finding his replacement — enlarging the corps. We are constantly looking for ways to get people to join the effort, but realize that motivation comes (entirely?) from within.

If HCN, or Wild, or Margaret Murie, or somebody, could tell environmental leaders, at the grassroots level, how to motivate people, how to trigger that flood of enthusiasm that is pent up in at least some of us, that would be perhaps the most far-reaching contribution you could make.

Connally Mears
Lakewood, Colo.

A tribute to Dave Robinson

by Joe Lamson



DAVE ROBINSON

Throughout the history of the Northern Cheyennes, tribal members have been called upon to lead their people against overwhelming adversity. In the autumn of 1972, Dave Robinson and several fellow Cheyennes banded together to form the Northern Cheyenne Landowners' Association. Their sole purpose at that time was to prevent the takeover of the reservation by outside energy companies.

The courage of the landowners' association and the tribe has led to some of the most important Native American and environmental victories in the past five years.

Dave Robinson's unexpected death this past August creates not only a loss for the Northern Cheyennes, but for all people who are involved in protecting the land and people of the Northern Plains from wholesale energy development.

The last five of Dave's 59 years were in many ways his most productive. It was in

these years that he took a lifetime of experience in construction and agricultural work and molded it into an organization that would not only fight corporate and bureaucratic control of his reservation, but would actively seek economic alternatives that were compatible with the Cheyenne's culture and environment.

We have all taken inspiration from the headlines, "Northern Cheyennes Declare Coal Leases Null and Void," "Tribe Opposes Colstrip Power Plants," and "EPA Grants Cheyennes Class I Air Standards." But we often miss the people and hard work behind those headlines. In the tradition of his culture, Dave Robinson did not like to boast of the landowners' association's accomplishments. Instead, he felt it was far more important to remain steadfastly with an issue and work for constructive alternatives.

Under Dave's directorship, the landowners' association has been in the forefront of the tribe's positions on energy development, held community-education prog-

rams on the problems caused by coal development, conducted extensive economic alternative workshops, established the first Cheyenne-controlled grain farm on the reservation, and helped alleviate some of the tribe's food problem by running more than 100 community gardens on the reservation.

Dave now lies at the foot of a hill where two young Cheyennes defiantly died protesting their people's removal to the Oklahoma Territory in the 1800s. The deaths of those warriors served as an inspiration for their tribe as the Cheyennes fought their way back to Montana. The work of Dave Robinson and the Northern Cheyenne Landowners Association is a continuation of that fierce Northern Cheyenne pride and determination.



Guest Editorial

HCN

We must save the swamps, too

by Charles Warren

Council on Environmental Quality

Congress will soon decide how many billions should be spent to clean up the nation's waters. Ironically, the same clean water legislation may lead to widespread destruction of our nation's wetlands, a natural resource of immense environmental value. If they are destroyed we lose one of the richest habitats on earth for fish and wildlife, natural capacity to filter pollutants from water, and buffers against storms and floods.

The 1972 Federal Water Pollution Control Act established protection of these wetlands as an integral part of our national water system. Congress is now considering amendments to this act which would remove federal protection from 75 to 80% of the country's remaining wetlands. President Carter and a majority of the Senate are opposed to this House-approved amendment. Their differences will be resolved when Congress returns from its August recess.

Wetlands, better known by such names as swamps, bogs, marshes, potholes, wet meadows, and river outflow land, are important areas where water and land come together. Their vital natural functions, and their subtle beauties, are not immediately obvious to everyone. A seaside

salt marsh with its mud and coarse grass may lack the appeal of a rocky shore or sand beach; and a freshwater marsh edged with cattails is perhaps less dramatic than a forested mountain slope.

Many people have an understandable urge to put these places to some "good use" by dredging or filling them for housing tracts, shopping centers, pipelines, pastureland, marinas, or navigable waterways.

Yet this view is blind to the fact that wetlands play essential roles in natural systems. They absorb impurities and act as giant filtration systems. They remove pollutants such as nitrates from the water. By retarding high waters, they reduce the impacts of floods, oceans storms, and hurricanes. They stabilize water flows and help control floods. They provide essential habitat in the lifecycle of many birds and fish. They are important to the production of plant life, and in turn provide food for marine and freshwater animals.

There can be wetlands protection without excessive bureaucracy and red tape. The bill recommended by President Carter

exempted from permitting requirements most farming, logging, and ranching practices which cause little environmental damage. It directed the Army Corps of Engineers to speed up review of necessary permits. It also allowed states to assume major responsibility for wetlands protection in lieu of any federal agency. The Senate passed a bill along these lines.

In contrast, the House measure carves out vast wetland acreage to be immune from federal review. In unprotected areas, a developer could fill a wetland for a shopping center as easily as a farmer could plant rice there. This insensitive approach

could lead to vast destruction of wetlands in the name of cutting red tape.

Important wetlands should be protected by sensible regulation. It would be an ironic and tragic waste if Congress, while spending billions on many necessary manmade structures for pollution and flood control, paved the way for the destruction of one of the most productive and protective of natural systems.

(Editors' note: Anyone interested in commenting on the importance of wetlands should write to his or her Congressional representatives asking that they oppose all weakening amendments to Section 404.)



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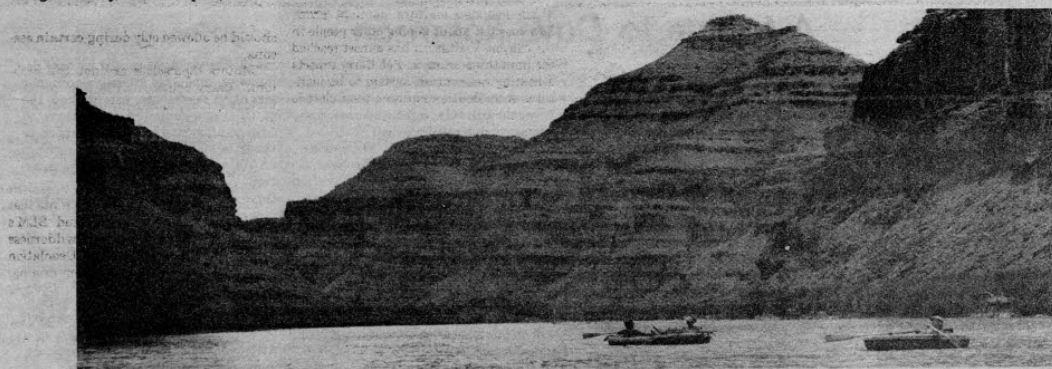
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WILDERNESS-SEEKERS and whitewater enthusiasts vacation in the same canyons that tortured John Wesley Powell's party in 1869.

Desolation...

(continued from page 1)

site that is being eyed by the U.S. Bureau of Reclamation. But of these resources on public lands, only the range is being utilized so far. Managing people remains the BLM's biggest challenge.

Because there are 67 of them and some are fairly large, rapids tend to dominate many visitors' trips down Gray and Desolation Canyons. They were central in our minds, too, as we gathered at Sand Wash, to begin a week-long trip organized by Thorne Ecological Institute.

We were to run the rapids in one-person plastic rowboats, called Sportyaks. In the beginning we were most concerned about whether the 18 of us, some of whom couldn't row a straight course in calm water, would ever make it out of the canyon. In the end, after experiencing the peace and the beauty of the canyon as well as its power to exhilarate and exhaust us, we worried more about how to keep threats to the river from coming in — things like dams, coal mining, oil and gas drilling, too many cows, and too many people.

Saturday is placid. We float along in calm water, spot birds, talk geology, and learn to keep our boats on course.

Powell nearly lost his life here, climbing up a steep, ledgy wall to get a look at the land beyond the river. He jumped from one foothold to another, and then found himself unable to go forward or back. He started to shake from his struggle to find a hold.

Just in time, one of his men on a ledge above pulled off his pants and dangled his long underwear within Powell's reach. The one-armed Powell let go of his handhold to grab the long johns and was transferred to a safer spot.

The 600-foot cliffs here, part of the Green River Formation, contain oil shale. It weathers to a chalky white and gives the canyon a pale, desolate feel, despite the willows, tamarisks, and cottonwoods along the shoreline.

At first, I imagine that Kloefer's statement about this being his favorite stretch of the river is just good salesmanship, since he is our outfitter. I become more convinced of his sincerity when our guide, Ross Garrison, declares that we are going to haul all of our excrement out of the canyon in sealed containers on the support boat. BLM requires only that groups treat and bury human wastes. Kloefer, an amiable, burly, black-bearded man, says he became upset with the standard practice in Grand Canyon, where every place he dug had already been used.

He and his boatmen are strict with their clients about other camp rules. You feed

your food scraps to the catfish; you pack out unburnable trash; you throw ashes from the fire into the main current of the stream. If you have a fire high on the beach, you put it on a tarp covered with sand so that the ashes are completely transportable. Before you leave a camp you pick up the legacy left by other parties, as well as your own trash.

Kloefer says he gets more satisfaction out of taking a group down the river than he gets by going on his own. He is angry when he sees other groups abusing the wilderness, but he is not upset by the number of people we see in the canyon.

"GOOD FOR THE LIVER"

Each in our separate boats, the current orchestrates our socializing. As Kloefer and I talk, he drifts toward the middle of the stream. The faster current there moves him slowly past me. I row for a while to keep up. Then, having been baked by the sun for long enough, I slip overboard and drift beside my boat, weightless and cool.

Down this far from its source in the Wind River Mountains of Wyoming, the Green carries a heavy load of fine silt. We were told by Ross the first day, like children about to get a dose of medicine, that we would have to drink the tawny stuff. I had been warned by singer Katie Lee, "Half of it's sand, but it's good for the liver." When I grew thirsty enough to drink it, I was relieved to find that, while I could see the said, it was so fine that I couldn't feel or taste it.

My reaction to the first small waves we encounter was to "Major Powell it" (a term I learned later). Facing the rapid, I pushed myself forward with the oars, thinking that by doing so I could skim over the waves and be out of the rapid as soon as possible. I noticed, with alarm, that I didn't have much control.

"Neither did Major Powell," Ross explains. This technique relies upon the rower's ability to think quickly and to go faster than the current, which makes the boat maneuverable.

The alternative is to row upstream, making the boat go slower than the current, while the current inexorably pulls you downstream. This technique allows time for calculating.

Sunday morning is a lazy float. Yellow-breasted chats, blue grosbeaks, and kingbirds occasionally pop out of the willows at the water's edge. The canyon rim above us is a haven for raptors.

A group of about 20 kayakers passes us while we're stopped for lunch. They look sleek, smooth, and cocky in their craft. Our boats, while not as racy, are serviceable. You can't lean back, drink a beer, and read a book in a kayak. Our guest celebrity on

the trip — author, artist, and naturalist Ann Zwinger — even sketches in her boat. You can't do that in a kayak.

After we've finished our lunch, we pass the kayakers having their lunch. This "playing tag," as it is called by river rats, makes us feel surrounded all day, even though we are actually near only one other

leads a hike up the canyon to a rock structure on the side of the wall believed to have been built by an ancient culture, the Fremont people. She says it may be a watchtower and is probably around 900 years old. While only 50 feet up from the sweltering valley bottom, it is shady and cool in the rock shelter.

From that vantage point, where the Fremont people may have spotted their game or their enemies, we look out over a dusty range. A Hereford's body lies rotting in a small spring just below us. Some cattle wander down to the river's edge, and in this drought year at least, they are doing visible damage.

RAPIDS AHEAD

After the hike, we tackle the rapids. Adrenaline surges into my system, and I'm as jittery as a coffee addict. The confidence I felt at Jack Creek erodes as the rapids grow.

In one rapid, I turn a little too much to pull myself away from a rock, and a wave sends my boat spinning. I hit the next wave broadside, and it fills my boat. In fact, the boat is so full of water that I'm floating. I brace myself by pressing my legs against its insides. Luckily, there's a calm cove ahead on my right. I turn sharply (as sharply as one can rowing a bathtub full of water) and scrape up onto the beach.

Two people capsize this afternoon, one apparently due to poor judgment and the other due to the whim of the river. Their spills make me nervous. I backpaddle more than necessary as the flat water of the tongue sucks me into the waves. I clutch the oars and slap at the water, fighting with the grim intensity of a survivor who fears she's about to go next.

Then quite suddenly, one of the easier rapids relaxes me. I start to enjoy the motion of the waves. I find I can weave in and out on the edges of them. It's a little like skiing moguls or riding a horse through a hummocky field — and just as unpredictable.

At Steer Ridge Rapid, one member of our group, Phil Flores, encounters what we later learn is one of the classic river running traps. Choosing a route that avoids protruding rocks, he hits a "pillow" (submerged rock) instead. His boat scrapes over the rock, hesitates, then splashes into the



BOB BARRY, a Bureau of Land Management recreation specialist, says that Desolation and Gray Canyons are receiving "moderately heavy" use. The bureau may institute a reservation system next year.

group. It's hard to hide in a river corridor, we find, even in a relatively desolate one.

The peak of excitement on Monday is Jack Creek, our first real rapid.

Our instructions are simple. Aim for the flat water that makes a "V" into the rapid, "the tongue." That's where most of the water is going. Stand up at the mouth to plan your route. Backpaddle a couple of strokes to gain control of the boat. Then wind your way through the rapid, turning at a 45 degree angle to the current and pulling yourself away from obstacles, trying to take each wave head on.

For most of us, the physics we'd been talking about for the last two days works at Jack Creek. We lust for more.

Tuesday we row a short distance from camp to Firewater Canyon. There, Ann

"I find that swimming is easy," John Wesley Powell reported. "When a breaker rolls over me, I close my mouth and am carried through it."

Desolation Canyon is the Green River's most pristine section in Utah. Now river runners, bureaucrats, and Indians are faced with the choice of whether or not to keep it that way.

deep hole behind it. His boat pauses, and for a moment he looks safe.

But his troubles have only begun. A wave crashes onto him and pushes him closer to the rock. Tentatively, he pushes forward with his oars. The wave snaps him back. He pushes again, but his boat won't budge. Finally, in the Major Powell tradition, he makes a mighty thrust forward, and we see him bobbing up and down amid the friendly waves with the rest of us. The entrapment and escape took 30 seconds for us to watch and 30 minutes for him to experience, Flores says.

Powell swam through this rapid in July of 1869. He broke an oar soon after entering it, narrowly missed a rock, and then was tossed out of the boat by a wave.

"I find that swimming is easy," Powell reported. "When a breaker rolls over me, I close my mouth and am carried through it."

We camp on a sand beach at the mouth of Steer Ridge Canyon that night. I nap, and when I close my eyes I can still feel myself rolling in the waves. Struggling to avoid an imaginary rock, I wake myself up with a jerk just in time for dinner.

Later around the campfire, the darkened cathedral of a canyon and something about having been through the rapids makes us quietly euphoric. Someone says they wouldn't mind if the group were marooned together forever, the last people on earth. I wish the trip were longer. I wish I were a part of the canyon, and that these people could remain, too, to share it with me.

WASH DAY

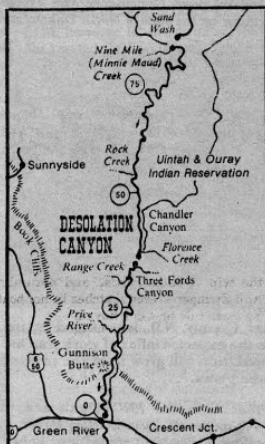
Wednesday, only a few miles downstream where clear water comes in at Rock Creek, we wash all traces of the canyon from our clothes and bodies. The kayakers stop here, too. That makes about 40 of us in this desolate wilderness, with our clothes hanging all over the bushes. A few of us hike on the trail that Ross tells us leads to the Fremont petroglyphs. Strewn with people, drying underwear, and litter, the place seems more like an amusement park than a wilderness.

Rock Creek has apparently been as attractive to the Bureau of Reclamation as it is to the river runners. Ann tells us about a plan, dormant now, to dam the creek for a

"The guys that pour their grease in the sand get hammered by the river."

pump storage hydroelectric generating plant. If there were any people along who would have once found that project interesting, the 40 miles of canyon we have floated so far has changed their minds. The group seems uniformly horrified by the proposal.

On Thursday we stop at what is left of the McPherson Ranch, which is famous as a stop on the "Owlhoot Trail" used by outlaw Butch Cassidy and his Wild Bunch. Now McPherson's "Cradle M" Ranch is owned by the Ute Indians and is part of the Uintah and Ouray Reservation. A fire has destroyed what used to be a sprawling mulberry, pear, and apple orchard. A modern



pink building, the Florence Creek Lodge, stands in the red dust with the remnants of the old McPherson place behind it.

The Utes own much of the east side of the river through Desolation and Gray Canyons, from Tabyago Creek to Coal Creek. To the dismay of some canyon lovers, the Bureau of Indian Affairs (BIA) has opened the bidding on oil and gas leases there, near Peters Point 35 river miles to the north of us. BIA says no decision about whether to actually lease has been made, however.

As we move out of Desolation Canyon and into Gray, the country begins to open up majestically. The canyon bottom is wide and luxuriant, compared to the narrows upstream. The sculptured cliffs and pillars are red shale and tan sandstone of the Wasatch Formation.

The drama of this landscape unfolding takes us right into what one guidebook calls "a boulder-studded maelstrom" — Three Fords Rapid.

Kloepfer leads the way down a steep chute into the biggest waves we've encountered yet. They thrust his bow up toward the 11 o'clock sun, yet he strokes forward and somehow moves through them.

Not all of us escape so neatly. Three boats capsize in the rapid. The final flip is mine. Like Powell, I was surprised to find that swimming was easy, as long as I kept my mouth shut.

Powell was spared the number of witnesses I had to endure, however. As I floundered up onto the beach below the rapids, I was greeted by all of our group, all of the kayakers, and the riders on two rafts that had passed us two days earlier. That made about 50 people in all.

And as we looked up toward the chute, we saw two more flotillas approaching, carrying about 20 people.

"It's just like Lava Falls in Grand Canyon," one of the rafters told me. "Everybody hangs around like vultures to watch you crash and burn."

THE RESOURCE

While it still needs data on the physical carrying capacity of the canyon, BLM is using the figure of 30,000 user-days as the upper limit on recreational use. This figure

was determined from sociological data — which included visitors' opinions about how they felt about seeing other people in the canyon. Visitation has almost reached the limit this season, so Bob Barry expects a boating reservation system to be instituted soon. Boaters running the Colorado River through Grand Canyon are already operating under this system.

River runner and writer Rod Nash has proposed the reservation idea for any areas that appear to be in danger of being too well loved. He likens the wilderness experience to a play or concert where all of the seats are sold out. You wouldn't go sit on somebody's lap, would you? Then, he asks, how can you resent a reservation system in the wilderness?

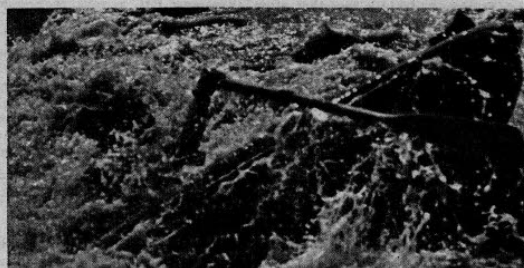
Barry also hopes that limiting groups' sizes will ease future strain in Desolation Canyon. He suggests a maximum of 25 people for commercial groups and 15 people for private groups.

Regulating the season for various users is another alternative, Barry points out. "If you float the canyon in October or in May, I can almost guarantee you won't see anybody else," he says. In June, July, and August, you must be prepared to be more tolerant.

Barry's ideas will be incorporated in a plan to be completed this fall, from which BLM managers will set policy. It seems clear that regulations stricter than the status quo will emerge to handle what Barry calls the "moderately heavy" use the canyons are receiving.

Some users may balk, feeling that a well-managed wilderness is a contradiction in terms. Barry hopes that the agency can quell such protest by limiting its contact with most users to pre-trip planning. Once people enter the canyon, he'd like

THREE FORDS RAPID is a "boulder-studded maelstrom," according to one guidebook. In it, Sportyaks proved unsinkable, but definitely not untippable.



them to be free to "forget that there is a BLM," he says.

Kloepfer suggests that while strict management may help, you are still going to see people when you visit wildernesses in the future, especially river wildernesses, where everyone follows the same route. He suggests that learning to tolerate the presence of other people, as long as they are treating the land with respect, may be necessary.

Motorized boats are allowed in Desolation Canyon, and Barry doesn't think they are a problem. He cites a Utah State University poll of canyon visitors: 52% said motors should be allowed, 35% said they should be prohibited, and 6% said they

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should be allowed only during certain seasons.

"Motors themselves are not the problem," Barry believes. "It is the fact that motors and big parties have a tendency to go hand-in-hand."

For now, BLM policy is to manage the canyon in a way that preserves the option of wilderness or wild and scenic river designation later. Desolation is on President Jimmy Carter's list of river segments that deserve further study. That, and BLM's Organic Act mandate to protect wilderness lands, will temporarily defend Desolation from major threats like dams or mining, Barry says, at least on lands controlled by the public.

Kloepfer is hopeful, but skeptical about BLM's ability to defend the canyon. He points out that traditionally, before the recent passage of its Organic Act, the agency has been "a dog with no teeth."

Among some river runners, it is said that a mystical force is at work protecting the canyon and its friends. It's called the Goddess of the River or the Maid of the Canyon, depending upon whom you talk to.

"I don't know exactly what it is yet," Kloepfer says, "but for me it has been a guardian spirit. If you do things in harmony, it takes care of you. But the guys that pour their grease in the sand — they get hammered by the river."



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Firms buy...

(continued from page 1)

until ANG and Walker reached a settlement.

ANG's Boe says, "Once we consented to buy his property, his concern was dropped. But, you have to pay more — considerably more — for the farm than you would for an ordinary purchase." The reported selling price for Walker's 20 acres was \$200,000. The land was purchased early in 1977, even though ANG says that it does not need the land for the operation of its plant. With the sale, Walker's reasons for objecting to the special use permits became moot, and the permits were granted.

Joseph Walker couldn't be reached for comment, but Mrs. Walker says, "We just hated to sell because we settled in this place for 18 years. But they had optioned all the land around us." Both of the Walkers are in their 70s, and she said, "At the age of 72, it's hard when you have to pull out."

Walker says, however, that even during the early construction phases of the plant, "it got so bad that I just hated to be there. All the noise and dust was terrible, and it's going to be worse when they get the whole gasification plant operating."

FEARS DISAPPEAR

The company's difficulties with the landowners were not over, however. Boe says, "Most of the concerns are based on

ANG's local representative says that when the company consented to buy an opponent's property "his concern was dropped. But, you have to pay more — considerably more — than you would for an ordinary purchase."

fear. Once the community understands certain things, their fears disappear. We go and talk to the people individually and see if there are grounds for their fears."

One of the people the companies visited was Eugene Keller. Boe says that after several discussions, it became clear that "what he (Keller) really wanted was to sell his farm. Keller headed the landowners group. Once we settled with him, the concerns of the whole landowners group fell apart."

Keller's land was purchased by North American Coal, ANG's coal supplier, for use for haul roads. NACCO traded Keller

about 1,000 acres of land south of Mandan, N.D., Boe says, for his 320 acres in Beulah.

Keller says, "I still very strongly feel that this is not the place to put a plant." But, he says, the landowners group "is not taking any action because ANG has gotten what they wanted locally. There isn't anything more we can do."

He also says that the group did everything possible to prevent the plant from locating in Mercer County, "If something is



IMPENDING GROWTH facing Mercer County, N.D., is presaged by the construction of trailer courts to house the expected influx of workers. One study estimates that the county's population will grow from the present 6,000 people to over 14,000 within three years.

not being done about it, it's not because we didn't try. These challenges take money, and farmers don't have big money these days."

Part of the problem the farmers face in Mercer County is the result of coal leases signed years ago. Keller says that he leased

the coal under his land 12 years ago, and many other farmers sold their minerals even before that. "If we had been told that the plans would destroy the farming community, we wouldn't have leased the coal 12 years ago. But," he says, "the companies try to run over the farmer."

Despite the companies' willingness to buy and trade land, both ANG and NACCO have refused to put up money for impact funding. Boe says that this will be taken care of through state programs and severance taxes. Basin Electric, however, will set up an impact alleviation-program

much like the one it established in Wheatland, Wyo. (see HCN 1-28-77).

PLANT'S PROBLEMS

Although citizen opposition seems to have died in Mercer County, the ANG plant is still far from construction. The company is awaiting approval from the state public service commission and the Federal Power Commission. And a recent ruling by the state of North Dakota says

that both the ANG plant and the 440-megawatt Basin Electric Power Antelope Valley plant are planned to be located on prime agricultural land, which is forbidden by state law.

In addition, neighboring Dunn County residents have petitioned for a Class I air quality designation for their county. This would allow no further deterioration of air quality in the county and could affect the construction of the energy facilities. A spokesman for Basin Electric says that the company is uncertain what impact such a ruling would have on the planned energy development, but, he says, "There is no mechanical device on the market that can reduce emissions enough to meet Class I standards."

Finally, the eventual construction of the ANG gasification plant rests upon the approval in Congress of government loan guarantees for synthetic fuels. Boe says that the company is confident that the guarantees will be forthcoming, but the outlook in Congress is still uncertain.

Despite the potential of exploiting these issues, the citizen opposition to ANG and the power plants seems unlikely to regenerate. ANG and NACCO have apparently robbed the groups of their leadership. After trading his land to NACCO, Eugene Keller told the *Hazen Star*, a Mercer County newspaper, "It all seems like a lost cause now. We've spent nearly all our money, we have a few bills to pay, and we feel reluctant to ask (supporters) for more money if it's not going to do any good."

The farmers' experiences in Mercer County prove at least one thing. As Keller points out, the energy companies have the money to drive the opposition out of existence. Fortunately for Keller, he has the option of moving to another area. The community he is leaving is not so fortunate, however. As he says, "It's going to be overrun. We can't keep on farming."



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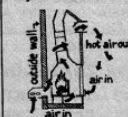
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Interior moves to slow agribusiness

The U.S. Interior Department has announced a plan that would restrict ownership of land irrigated from federal water projects to 160 acres of land, with an option to lease 160 more. The rules are designed to limit corporate ownership of agricultural land irrigated with federal tax dollars.

Interior Secretary Cecil Andrus says, "Let me emphasize that these proposed regulations are not designed to jeopardize legitimate family operations. They are designed to help the family farmer, not agribusiness."

The rules will require owners of more than 160 acres of land receiving federal water to sell the excess land above that limit. This has long been required by law, but enforcement has been lax. The Bureau of Reclamation commissioner estimates that the rules will require the sale of 1,074,000 acres of irrigated land in the Western states.

Under the new regulations, farms utiliz-

ing federal water would not necessarily be limited to 160 federally-irrigated acres. For example, according to the *Denver Post*, a farmer and his wife could each own 160 acres and each be entitled to lease 160 acres more. Corporate ownership of the land will be limited to small family corporations under the rules.

The regulations will apply only to the 17 states in which the Bureau of Reclamation operates. The states are Oregon, Idaho, Washington, California, Nevada, Texas, Nebraska, North and South Dakota, Montana, Utah, Wyoming, Kansas, Oklahoma, New Mexico, Arizona, and Colorado. Interior will accept comments of the rules for the 90 days following the Aug. 25 publication date and may hold public hearings on them. Comments should be sent to Commissioner, Bureau of Reclamation, Dept. of Interior, 19th & C Sts., N.W., Washington, D.C. 20240. Attn: Code 410.

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Geologists document off-road vehicle damage

by Sarah Doll

The problem of off-road vehicles (ORVs) overusing public land was officially recognized in 1972 when then-President Richard Nixon issued Executive Order No. 11644, ordering the various land management agencies to adopt specific policies for ORV use. Since that date, the estimated number of ORVs in use has risen from 5 million to more than 12 million, with an accompanying increase in public land acreage in use by ORV enthusiasts. The federal agencies involved have been slow in formulating their policies.

The Bureau of Land Management (BLM)

originally intended, following Nixon's order, to leave all lands open to ORV use until they could be studied and classified for use or non-use. A lawsuit concerning this policy brought by the National Wildlife Federation was decided against the BLM, however. Since the ruling, the BLM has limited ORV use on some lands where environmental damage or resource conflicts were apparent.

In May of 1977, President Jimmy Carter issued an amendment to the executive order calling for a halt to ORV use on land where environmental damage has occurred or might occur. An enormous response was heard from ORV users all over the

country. Misunderstanding and confusion resulted, with many people fearing ORVs were to be banned on all public lands.

Also in May 1977, the Geological Society of America issued a report entitled "Impacts and Management of Off-Road Vehicles." The report by the society's Committee on Environment and Public Policy resulted from several months' field research, mostly done in California, where ORV use has been heavy.

The committee reports that soil compaction caused by ORVs has been detected to depths of three feet. This reduces the amount of water the soil can hold. The water that remains is held more tightly, and so is less available to plants and animals. Compaction, by removing air spaces in the soil, coupled with the removal of shade plants which usually accompanies ORV use, also makes the soil hotter in the day and colder at night. These temperature extremes can affect and sometimes destroy plant and animal life.

The committee reports that ORV-caused erosion is of two kinds:

- (1) direct abrasion by the vehicle and
- (2) a higher rate of erosion by wind and water.

The first type is usually seen as dust. One motorcycle event featuring 3,000 riders resulted in 600 tons of airborne dust. The second type is seen long after ORV use of an area has stopped, especially in dry areas where tire treads have destroyed the crusts that would hold the dust down. Regions of heavy rain are heavily eroded in areas where ORVs have ruined the vegetation: Hillsides, often the favorite haunts of motorized recreationists, are especially susceptible to erosion.

Water in areas of intense ORV use is often reduced as much as 90% due to increased run-off and soil compaction. This is a self-sustaining cycle of erosion, as fewer plants can grow to hold the soil when so little water is available. In addition, the available water is often polluted by the gasoline, oil, and human wastes that are discharged at ORV sites.

The committee's report presents a particularly disturbing picture when it deals with ORVs and wildlife. Small plant and shrub habitat is quickly killed by ORV traffic, and large trees eventually can be toppled by erosion. Often noxious weeds, such as Russian thistle, move into a disturbed area.

Sometimes ORV drivers will harass wildlife in back country or cause indirect

damage to wildlife through ORV noise and air pollution. Mating calls and territorial warnings are drowned out. Since ORV users often have hearing loss, it is suspected these machines cause similar losses in wildlife.

The committee suggests several methods for dealing with the ORV problem. First, it calls for an inventory of all public land resources, and evaluation and ranking by those with professional knowledge of each resource.

The second step would be zoning for use or non-use. Areas could be zoned for use if this would (1) cause comparatively little damage to resources, (2) create no safety or health hazards to non-ORV users, (3) cause no environmental impacts outside the boundaries of the area, and (4) create no conflicts with other existing or proposed uses of neighboring lands and waters. "Orphan" or "sacrificed" lands, such as those ruined by strip mining, might be considered for use.

The third step involves setting up registration policies for ORVs and licensing of their operators.

The committee also recommends careful management and monitoring of use areas, and stiff penalties for ORV users found on lands zoned for non-use. Reclamation of areas, when necessary, should be done with revenues from ORV licenses, the committee suggests.

Most ORV users and groups fear government regulation of their sport. Kent Lamberson, head of Motorized Vehicle Coalition, Inc., a group of ORV clubs in Idaho, was interviewed by the BLM for its July 1977 newsletter, *BLM Issues*. While he admits that ORV use can cause environmental harm, he insists that proper education of users can minimize such damage. Furthermore, he says, "We should all be aware that any use causes damage of some kind. Hiking, horses, camp trailers, wind, rain, they all cause some damage. How much damage with what effect should be the principle concern." He argues that closing one area to use simply intensifies use in another area, and it is this intense use that causes the most severe damage.

The BLM feels that properly managed off-roading is a legitimate use of public land, and that President Carter's amendment will not result in widespread land closures.

The agency will, however, seek public opinion on this issue.

Ski resort limits cars, fireplaces to protect air



'THE FIRE IS SO DELIGHTFUL'

Many visitors to mountain ski areas don't think the experience is complete without a fireplace to sit around after a day on the slopes.

In an effort to protect its air quality -- and its tourist economy -- one of Colorado's best-known ski resort areas has launched an attack on both fireplace and automobile emissions.

Many people near Aspen, Colo., had begun to complain about the severe air pollution during the winter when there are thousands of cars and when many of the people in the condominiums, motels, and private homes all light their fireplaces, according to Pitkin County engineer Jeff Davis. Davis wrote the new county regulations.

Now, the county has imposed strict standards to control the number of fireplaces allowed per new dwelling as well as their efficiency in providing heat.

In addition, the county can declare an alert if air conditions are serious enough. During an alert the county has the authority to impose restrictions on the use of cars, fireplaces, restaurant grills, and other pollution sources. The county may say that no cars can be driven in designated auto-free areas, that cars must be left in intercept parking lots and the passengers transported by public mass transit, and that fees

or other disincentives must be imposed to discourage people driving into areas with high concentrations of pollutants.

Davis says that public hearings were held on the regulations and very little opposition was expressed. He explains, "The community is in support of regulations of this nature because pristine air is a very real asset to a community whose industry is based on tourism. You just normally expect to have clean, clear air when you travel into the mountains."

Other ski resorts in Colorado are also finding that the combination of fireplace smoke and auto emissions in the narrow mountain valleys is having a serious effect. The town of Telluride passed an ordinance saying no new fireplaces could be built, but Davis says it may have to be amended because of the extreme criticism that it prompted. The town of Vail is also gathering data and will soon pass a regulation, which Davis expects to be similar to Pitkin County's.

Pitkin County's regulations limit the number of fireplaces to one per single family dwelling or per unit in multiplex dwellings and one per lobby of a hotel or motel. All fireplaces must be efficient enough that they create more heat than is lost as the result of their use.

No restrictions were put on wood-burning stoves, which have a much higher efficiency than fireplaces. Davis says conventional fireplaces have only 5-10% thermal efficiency. He attributes the lack of opposition to these regulations to his supposition that "everyone seems to be energy conscious, and almost everyone realizes that a conventional fireplace is a very inefficient heating device."

The regulations provide for a \$300 fine per day of offense and a variance board to consider suspending or modifying enforcement under certain conditions.

William Auberle, director of air pollution control for the state health department, says, "We hope this will encourage other communities to exercise their prerogative in adopting regulations to deal with local air pollution problems."

Davis says the county has the authority to enact such regulations as long as they are at least as strict as federal regulations. The limits set for individual pollutants are very similar to federal limits, he says. However, he says it is possible that further studies will indicate that Pitkin County standards should be higher because of the effects of the altitude. At higher altitudes, the human body is less efficient and needs more oxygen, he says.



THE NUMBER OF OFF-ROAD VEHICLES in use in the U.S. has risen from 5 million in 1972 to 12 million, according to a recent Geological Society report.

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AERO presents:



THE NEW WESTERN ENERGY SHOW in Hamilton, Mont.

Photos courtesy of AERO

The New Western Energy Show

Through lighthearted theater and practical displays, the New Western Energy Show is making the transition from fossil fuels to renewable energy sound feasible — maybe even fun — to hundreds of Montanans.

The show is sponsored by the Alternative Energy Resources Organization (AERO) of Billings, Mont., and is supported by the state, through a grant from coal tax revenues. It does not tell people what to do. It entertains them with ideas and gives them a chance to see, touch, and build alternative energy devices. For those who have heard enough serious discussions of the energy crisis, the show offers everything from songs about the sun to solar cookies to make the topic of energy seem less grim.

The 15-person troupe, while all committed to energy conservation, has varied talents. The show's two coordinators, for instance, Robin Leenhouts and David Nimick, list designing, juggling, and bag-piping among their skills. Others are actors, musicians, teachers, and energy technicians.

Amid all the excitement, the troupe delivers its message forcefully. "Hopefully,

the show will stimulate you into conserving energy and using renewable energy; and perhaps you will begin encouraging local and state governments to do the same," says the show program.

The New Western Energy Show has been on the road for two summers. Something new in the 1977 show — a town forum — has enabled the troupe to respond to local needs. This spring "advance man" Randy Reinhart conducted a "renewable energy survey" of each town the show planned to visit. When the show arrived, Reinhart's information was included in a slide show highlighting the host town and its possible

renewable energy future. Reinhart also made arrangements for two special dinners — one with tradespeople and one with the community in general.

The show also set up an information "smorgasbord" in each town. There, for a nickel a sheet, visitors could assemble their own packets of information on renewable energy and energy conservation.

To back up the written information, visitors could see and examine about 20 working solar energy devices, including:

- two homemade air-heating solar collectors
- a water-heating solar collector made

by Miromit

- a homemade "breadbox" solar water heater

- a Kedco wind generator with a deep cycle battery and an inverter

- a Parris-Dunn wind generator with two golf cart batteries and an inverter

- a pedal machine with a grain grinder and a corn husker

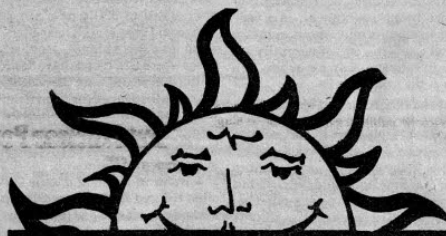
- a pedal machine with an electric generator

- a model solar greenhouse

- a Rife water ram.

The troupe visited Roundup, Miles City, Glasgow, Great Falls, Kalispell, Hamilton, Missoula, Helena, Livingston, and Billings this summer. A videotape of their afternoon and evening theater performances is available from Kye Cochran, Alternative Energy Resources Organization, 435 Stapleton Building, Billings, Mont. 59101. Membership in AERO, which includes a subscription to its monthly newsletter, is \$10 per year.

For those of you who missed the show this year, we are printing a portion of the script for the matinee performance entitled: "As the World Turns Off."



BOTH HOME-BUILT AND COMMERCIAL solar hardware are on display at the New Western Energy Show. Shown here is a home-built solar water heating system.

A SOLAR OVEN, in which the troupe baked bread and "solar cookies," was on display in the 1976 show. The 1977 show has added a commercial solar oven, the Solar Chef, which reaches 500 degrees F. The homemade version shown here seldom gets hotter than 375 degrees F.



As the World Turns Off

©AERO, 1977

(An actress walks onstage holding a cardboard TV before her blank face. She reaches up and turns on the TV; her expression becomes animated, and she says, "Good afternoon, and welcome to this week's episode of 'As the World Turns Off.' You will recall that at the end of last week's episode, Fossil Fuel, hounded by the demands of Modern Society, had almost reached the point of exhaustion. Watch this week as Fossil and Mod search for a way out of their predicament, almost fall into the clutches of a villain, and finally find a friend they can really count on." Actress exits.)

(Enter Fossil Fuel, dressed like Cinderella, sweeping floor with a broom)

Fossil Fuel: Oh dear, a fossil's work is never done. Modern Society has me working 24 hours a day. There's no end to it! First thing every morning there's electric alarm clocks to ring in bedrooms all over the country. Then I gotta chug on over to the bathrooms and brush those teeth, buzz those razors, and run those showers. Then it's back to the kitchen to toast bread, griddle waffles, and make coffee. And that's just breakfast! Now don't forget, Fossil, there's dishwashers to run, TV's to turn on, radios and car batteries and air conditioners and lights in all the office buildings downtown! And that's just electricity! I tell you, I'm getting exhausted! (She collapses on her broom.)

(Enter Modern Society. He's a real hip cat in sleeveless bluejean jacket, shades. Music changes to '50s rock beat.)

Modern Society: (To audience:) Hey! (To FF:) Hey Fossil baby, slap me five! Do me a favor before you knock off for the night, will ya? Gas up my new superpower bad mileage snowmobile.

FF: I'm sorry, Modern Society, I can't go on serving you this way any longer. I'm afraid I'm going to . . . run out!

MS: Hey Fossil baby, whaddaya mean run out; we were just getting started! (Puts his arm around her)

FF: (Pulls away angrily) I mean your joy ride is over, Modern Society. I'm giving you my 10 years' notice.

MS: Fossil, baby! (They freeze as suspense music signals entrance of Nuclear Power, wearing black cloak and huge wolf mask with moustache.)

Nuclear Power: Perhaps I can help you two.

FF: But who are you?

MS: Classy threads, pal, what's your racket?

NP: I don't make a racket; I am clean and quiet. I am . . . Nuclear Power. (To audience:) Now for some dirty work . . . If I can just get them to sign this contract, I'll have enough power to destroy the world!

FF: But Nuclear Power, what big eyes you have!

NP: All the better to see to your comfort, my dear. (MS and FF freeze in attitudes denoting delight. NP says in aside to audience:) Comfort — hah — she'll be working harder than ever for me: building my plants, mining my uranium, and transporting my radioactive wastes!

MS: Hey, Nuclear Power, what a big nose you have: what a honker!

NP: All the better to sniff out any problems that may arise. (FF and MS freeze in questioning stance. NP to audience:) Problems? Haha! Little does he know that the uranium that fuels my power will be used up by the year 2000, and I don't care!

FF: But Nuclear Power, what big TEETH you have!

NP: All the better to give you a taste of the good life, my dear. (FF and MS freeze in an attitude of pleased anticipation. NP in aside to audience:) Life . . . aha . . . plutonium, just one of my byproducts, contains in one pound the potential to cause lung cancer in nine billion human beings!

FF: (Pulls MS aside) Oh, Mod, just think, if he helped us out, I could have some spare time!

MS: I knew I'd think of something, Fossil baby. We got it made in the shade. If we put this guy to work, I'll have all the energy I need and you won't have to run out on me. (To NP, in an official tone of voice:) Hey, Nuke, you're not going to split on us, are you?

NP: Of course not, Mr. Society. Now if you'll just sign here on the doomed — I mean dotted — line . . . I can begin right away. (Hands contract to MS)

MS: Sure thing, man. (He signs, and he and FF freeze in jubilant pose, about to slap hands.)

NP: (To audience:) Haha! They didn't read the small print! Their future is now in my radioactive hands! (To MS and FF:) Now, if you'll just follow me down the primrose path . . . (They prance off together till NP suddenly snarls and clunks their heads together; they collapse in a heap and the Sun enters to a grand chord on the piano.)

Sun: Unhand that fossil and that fool!

FF: It's the sun!

Sun: Let me reveal the true nature of this scoundrel. (Rips off NP's moustache)

FF: Why, he's a wolf, cleverly disguised as a villain!

NP: Curses, foiled again!

Sun: Ah, go fission! (Boots him off stage. To MS:) And as for you, give me those sunglasses! (Takes off sunglasses. He shields his eyes.)

MS: What's happening? What's happening? (Sees Sun) Oh, at last I see the light! Oh Sun, I was a fool all along! I ignored you and abused your daughter, Fossil Fuel. But now I see the folly of my ways. Do you think you could help me once again?

Sun: Well, you'll have to change your wasteful ways, Modern Society. If you cleaned up your act — and your air — I think I could rise to the occasion. After all, I do produce 60 trillion Btu's of energy every hour.

FF: And can I really count on you for a long time?

Sun: Well, I do expect to be around for another four billion years. Do you think that'll be long enough?

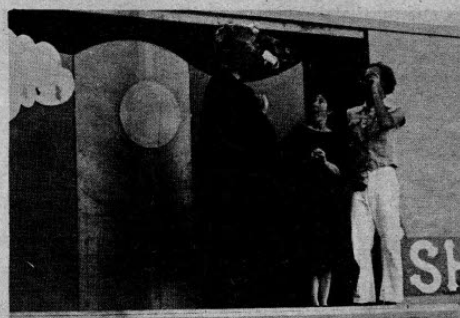
MS: My hero! (Slaps Sun's hands — gets burned) er, heroine!

Sun: Yeah!

Sept. 9, 1977 — High Country News-9



"Hey, Fossil baby, slap me five!"



"But Nuclear Power, what big TEETH you have!"



"Unhand that Fossil, and that fool!"



"I think that I could rise to the occasion!"

Solar power like meat and potatoes

Billed as a "supermarket," a solar energy trade fair in San Francisco last month aimed to prove that solar products are as easily obtainable as meat and potatoes.

Thirty-seven West Coast manufacturers and 15 distributors displayed their wares, along with the information booths of three federal agencies and a dozen public interest groups at an event called "Solarcon."

On the average, a sampling of manufacturers at Solarcon had been in business less than three years and had had a solar system in continuous operation for less than two years. Nevertheless, most companies were willing to warranty the various parts of their systems for 5 or even 10 years. Most salesmen represented small companies,

though Grumman, Alcoa, and Revere were also present.

One exhibitor, apparently referring to the trustworthiness of his comrades, said he felt more like he was in a used car lot than in a supermarket.

Fluid heating systems were more common than air systems at Solarcon, because, according to one manufacturer, they store heat more compactly and efficiently. Another manufacturer says he rejected air systems when he saw the quantity of clean, sorted rocks necessary for air heat storage. Fluid systems generally store their heat in water, which is easily obtainable by comparison.

Most solar collector boxes were made of

metal or plastic. Those manufacturers who did offer wood praised its low cost and its ability to insulate the side of the collector. One metal-box salesman pointed out that wood is not as durable as the alternatives, however.

One exhibitor admitted that the Solarcon crowd, which had paid \$5 each to see the displays, was conservative about buying solar systems. "I would be, too. After all, my company has only been in business for three months."

For visitors, the rows and rows of similar-looking solar collectors provided a valuable though somewhat confusing chance to compare products. Prices ranged from \$5-\$15 per square foot of collector.



Photo by Hubert Burke

OIL SHALE GETS GO-AHEAD. Turning down a request for more environmental studies, Interior Secretary Cecil Andrus told Occidental Oil Corp. and Ashland Oil Co. they could proceed with the first oil shale development in the U.S. The tract in northwestern Colorado was leased four years ago,

but development was delayed by environmental concerns and the companies' requests for federal subsidies (see HCN, 8-12-77). Andrus imposed 12 conditions on the approval and said there will be careful monitoring of the environmental impacts at every step. Photo of the Piceance Basin.

Reckoning from Washington

(Editors' note: Lee Catterall, who created and has produced "Reckoning" for us for the past four years, has come home to Wyoming. He is working for the Associated Press wire service in Cheyenne. His column has served 17 newspapers in Wyoming, bringing them news from Washington with a Western slant. From now on, Kay Coates' work will appear under the "Reckoning" headline.)

FEDS WOULD BUST THE BOOM

by Kay Coates

The General Accounting Office (GAO) consists of thousands of bookkeepers, accountants, investigators, and assorted experts on topics ranging from nuclear missiles to safety standards for federally-built restrooms. This summer GAO announced a new area of expertise — Wyoming boom towns.

Commonly described as the investigative arm of Congress, GAO set out to advise the nation's 535 lawmakers on whether the federal government should take a hand in helping small communities in six Western states cope with the staggering influx of people energy development is bringing.

They came to some startling conclusions. Conclusions which threw a monkey

(D-Wyo.) painstakingly-drafted plans to get federal "impact" aid for the state. Conclusions that President Jimmy Carter's top environmental advisers called "inadequate," "misleading," and not worthy of publication.

The report used Green River, Rock Springs, and the rest of Sweetwater County, Wyo., to illustrate how local people solved boom town woes. The statistics used are for the period 1970 to 1974:

—In 1970 the county had one doctor for every 1,800 people. In 1974 there was one doctor for every 3,700 people, while the nationwide average was 612 patients per doctor. Now, said the report, "health care capacity in Sweetwater County has been expanded by added physicians (mostly through the National Health Service program)." It didn't say what the new ratio was.

—The mental health caseload expanded ninefold, ironically mostly among longtime residents reacting to the "boom," the report said. "The level of health services is still in need of improvement and will require continued attention and effort," it admitted.

—Schools were "strained beyond capacity." Both Green River and Rock Springs went into debt by mortgaging all but 10%

Today, said the report, "projections" show the schools will have sufficient income in Rock Springs, but Green River "may have trouble meeting its needs."

—There wasn't enough housing, and sewers were too small for the influx. "Prices of recently-built homes were too high for the average worker." Today, the report said, "housing demands have been largely fulfilled by considerable single and multifamily construction, mobile homes, single worker complexes, and some substandard housing." It added that there are now plenty of "alternative mobile home spaces," apparently to comfort those now living in "substandard housing."

—Also on the brighter side is this conclusion: "The problem of providing adequate police protection have been partially alleviated by the decline in construction workers."

Based on these "success" stories, the report concluded, "We believe that the need for additional federal assistance at this time has not been demonstrated."

Legislative advisers to Roncalio and other key members of the House Interior Committee told this column that the GAO report is already being used against them as they argue that Easterners should be taxed to ease the burden on Wyomingites when the crowded urban areas turn to the



GOVERNOR WANTS SMALLER PLANT. Idaho Gov. John Evans has suggested that Idaho Power Co. scale down the size of its 500-megawatt power plant to 250-megawatts, but the utility says it could not economically build a plant that size. Idaho Power Co. has already scaled down its proposal, which was originally for a 1,000-megawatt plant.

BASIN SIGNS SOLAR AGREEMENT. Basin Electric Power Cooperative has signed an agreement with the U.S. Energy Research and Development Administration under which the company's headquarters will be used as a commercial solar demonstration project, according to the *North Dakota Union Farmer*. The preliminary design for the building, located in Bismarck, N.D., includes 5,000 square feet of flat plate collectors to supplement the existing heating system.

SOLAR PLANNING GRANTS. The Solar Planning Office-West has received a grant of \$697,500 for solar research projects in 13 western states, according to the *Denver Post*. The office is one of four regional offices in the National Solar Energy Research Institute.

N.M. UTILITIES PAY NO TAXES. The three major publicly regulated utilities in New Mexico did not pay any federal income taxes in 1976, according to *Seers Rio Grande Weekly*. In what the paper calls a "legal tax swindle," Mountain Bell, Public Service Company, and Southern Union Company avoided federal taxes by keeping two sets of books—one for rate making purposes and one for tax purposes. However, the accounting books that the utilities presented to the Internal Revenue Service show a net loss "due to a lucrative combination of tax breaks, adjustments, and deferrals which result in a negative federal tax figure." In fact, according to *Seers*, the utilities not only paid no taxes, but amassed multimillion dollar tax credits which they deduct from their 1977 taxes.

POWER LINE OVER MADISON. The Associated Press reports a hearing examiner recommends that a proposed power line cross the roadless section of Montana's Madison Mountains to the Big Sky ski resort. The findings of the hearing examiner were outlined by the chairman of the Montana Board of Natural Resources, although the report itself was not released to the public. Three routes were considered, including one along an existing power line corridor, but the hearing examiner preferred the route over the roadless section of the Madison.

PRBRC INTERVENES IN SUIT. The Powder River Basin Resource Council has voted to intervene in a lawsuit brought against the Missouri Basin Power Project in Wheatland, Wyo., by the state of Nebraska. The group wants to halt construction of the Grayrocks Dam, the power plant's primary water supply, until an adequate review of the water situation is conducted. PRBRC also said, "We wish to prevent any negotiated settlement of this lawsuit that would compromise the ability of Wyoming water users to develop or maintain water rights."

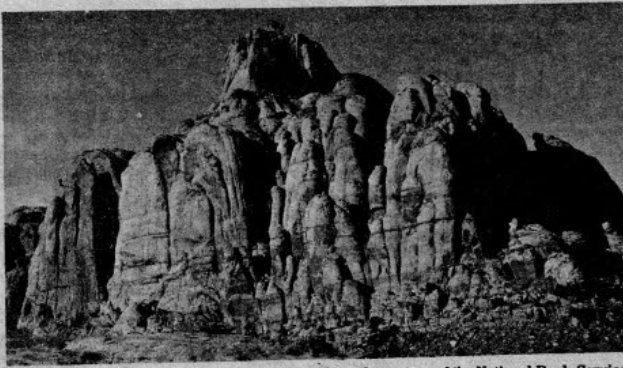


Photo by Bob Reynolds and courtesy of the National Park Service.

SITE CHANGE COULD KILL IPP. Intermountain Power Project (IPP) project director Joseph Fackrell objects to Interior Secretary Cecil Andrus' order to study alternative sites for the 3,000-megawatt coal-fired power plant. Fackrell says over \$3 million has already been spent on economic and environmental studies of the project at the proposed site, which is near Canyonlands National Park and Capitol Reef National Park. Fackrell said if the site is moved, it could kill the project. However, he has agreed to cooperate in reviewing alternative sites. The site will be determined by a board of federal and state government officials and business leaders, according to the DESERET NEWS. Photo of Capitol Reef National Park.

Poll says railroads, coal mines, and housing concern Gillette

The citizens of Gillette, Wyoming, in the heart of the West's coal boom area, apparently are not entirely pleased with the development of their community. The 1977 citizen policy survey, undertaken by the Gillette-Campbell County Department of Planning and Development, uncovers many concerns among the residents about the town.

Major concerns are: coal mines encroaching on the city limits; housing quality; and railroad traffic.

At least two Campbell County coal operators hold coal leases that extend up to the borders of the town. These companies have expressed their intentions to mine that coal under their lease terms. However, the poll says, 73% of the citizenry believes that mines should be at least three miles from the city limits. The county land use plan has recommended a two mile limit for the nearest coal mine.

One of the most striking aspects of any boomtown, including Gillette, is the preponderance of mobile homes. Most companies and planners anticipate large mobile home parks to house incoming workers. According to the poll, however, 84% of Gillette's residents would rather

live in a single family house, if such housing were available. Only 7.2% would continue to live in mobile homes.

On other aspects of housing, a plurality of those polled think that new residential building should not be allowed to occur in the vicinity of coal mines. Over half of the respondents said that subdivisions scattered throughout the county are a threat to agriculture.

Answering a question on the problems created by increased railroad traffic, 66.5% of those questioned said that even the current level of rail traffic is a hazard to both pedestrians and vehicles. And 57% of the respondents said that the railroads should bear most of the cost of constructing overpasses or underpasses to separate coal trains from other traffic.

On an environmental issue of statewide concern, 48% of the citizens polled said that coal should be exported to plants nearer to consumers, rather than converted or burned within Wyoming; 22% said that the coal should be burned within the state, while 20.3% were neutral, and 9% had no opinion.

North Dakota approves Coyote I, with conditions

The North Dakota Public Service Commission (PSC) has approved the first power plant to come before it since its new energy conversion facilities siting act came into effect, according to the Hazen Star. The three commissioners demanded that the five utilities building the 440-megawatt Coyote I plant meet several conditions to reduce socio-economic impacts on Mercer County, N.D.

Otter Tail Power Co. and the other partners will be required to have at least two people as local agents to assist affected communities on impact problems. In addition, if the state determines that adverse effects have risen to an unacceptable level, then the companies will have to pay impact alleviation costs. The PSC is requiring them to provide help in at least seven impact areas, including law enforcement, school funding applications, health care,

housing, recreation facilities, and general government services.

The consortium must also develop a program to monitor and evaluate socio-economic impacts. The utilities must investigate the feasibility of selling waste heat energy from the project to other commercial users, publish a directory of area services for new residents, and coordinate impact efforts with other companies proposing plants near the Coyote plant site.

The other owners of the plant will include Montana Dakota Utilities, Minnkota Power Cooperative, Northwestern Public Service, and Minnesota Power and Light.

Coyote I has received approval from the North Dakota Health Department but still must be approved by two federal agencies — the Environmental Protection Agency and the Rural Electrification Administration.



The HCN Hot Line

energy news from across the country

CHOICES, PHILOSOPHY DON'T JIVE. A Los Angeles Times columnist, Ernest Conine, after reviewing President Jimmy Carter's appointments to the Nuclear Regulatory Commission (NRC), questions his commitment to fighting plutonium. Carter has called for a ban on the separation of plutonium in this country and for a moratorium on the construction of nuclear breeder reactors, which produce plutonium. However, two of the three Carter NRC appointees say they disagree with Carter's proposal to defer construction of the plutonium-fueled breeder reactor at Clinch River, Tenn.

ATTACKS EMPHASIS ON AGRICULTURE. An Illinois wildlife expert says agriculture is given too much emphasis in his state's strip mining act. W. D. Klimstra says that in many cases, strip mined areas are reclaimed for use for forage, row crops, and forestry. While he says he can understand farming communities'

concern about the threat to rural economies from strip mining, he thinks there should be more emphasis on other uses such as recreation, roads, housing, water supply or waste disposal sites, industrial sites, fish farms, airports, and wildlife habitat.



LEASING SPLIT 'BIG PROBLEM.' Sen. Henry Jackson (D-Wash.) thinks that splitting public lands leasing responsibilities between the new Energy Department and the Interior Department will cause "one of the biggest problems in government over the next 20 years," according to **Public Lands News**. Jackson says coordination will be the problem. Under the new law, Interior will continue to prepare environmental assessments, decide where to lease, and administer leases. The Energy Department will handle economic considerations such as how much leasing, diligent development requirements, and implementing bidding systems. An aide says Jackson is not satisfied with a provision giving the President power to arbitrate conflicts between Energy and Interior.

Wolf

People have loved none more than the dog-like creatures on this earth; their unwavering devotion and companionship has captured the human heart. They seem to always return more love than they receive, thus making us more aware of what we should become. Love begets love.

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12-High Country News — Sept. 9, 1977

Land use, reclamation bills killed

Lamm vetoes bills that would reverse '76 progress

(Editors' note: Results of the 1977 Colorado Legislature emerged late this summer, after the governor's deadline for vetoing bills. This summary of the legislators' actions on environmental issues and the governor's decisions was written by Ron Lehr, a lobbyist for the Colorado Open Space Council.)

THE GOOD NEWS FIRST: auto emissions, insulation natural areas, non-game

Colorado has a serious air pollution problem along the entire Front Range urbanized corridor, due primarily to automobile exhaust. This year an auto emissions inspection and maintenance program was passed for the 10 largest counties in the urbanized corridor. This legislation received the support not only of the Colorado Open Space Council (COSC), but also of the state department of health, the Colorado Association of Commerce and Industry, the Automobile Dealers Association, the League of Women Voters, the Colorado Medical Association, and other groups.

The act (SB 231) provides for mandatory tailpipe emission inspections annually. If an auto fails the inspection, a tune-up will be required within 10 days to meet emissions standards. An emissions sticker must be displayed, similar to the safety inspection sticker, and violation of this requirement will result in a traffic citation.

Insulation in new residential construction and **energy conservation** in the design of new commercial construction will be required under two bills passed by the Colorado General Assembly.

The residential standard of R-19 in the ceiling was supported by the Colorado Home Builders Association. Environmentalists had hoped for a higher requirement, say, even the Public Service Co. of Colorado has an insulation standard of R-30.

The state is also now formulating a performance standard, which could be used by local governments as an alternative to the R-19 requirement.

The assembly passed a **natural areas** bill to provide for identifying and preserving unique examples of Colorado's natural heritage, scientific study areas; habitat for threatened species, and the like. A modest appropriation was included in this bill to hire a coordinator to get the program started.

Non-game wildlife funding will be encouraged under the provisions of another bill that will put a check-off box on the state income tax form. This will allow taxpayers to donate \$1, \$5, or \$10 of their refund to the state non-game wildlife program.

THEN, THE BAD NEWS: Land use, reclamation, minimum flows, severance tax

The state's **land use commission's** funding was reduced by 71% by the 1977 legislature.

The legislators also attempted to eliminate within two years both the commission and the law that provides for local governments to warn the commission about problems by identifying areas of state interest. Gov. Dick Lamm vetoed this legislation, however.

The attack follows the commission's long consideration of the Pawnee coal-fired generating plant near Brush, Colo., which is proposed by the Public Service Co. (PSC). PSC lobbied to gut the commission's power to request local governments to consider designation of matters of state interest. PSC argued that the commission's consideration of Pawnee was delaying construction.

In other land use action, the legislators

passed a property tax incentive to preserve "residential open space." The bill will give a property tax break to owners of 1-35 acres of land surrounding a residence. Critics of the bill say owners of large estates will benefit, small lot owners will pay, and sprawl will be encouraged by a lack of planning.

There are no provisions in the bill for public access, nor will it serve other public



Drawing by Hannah Hinchman

needs such as protecting floodplains or protecting agriculture from conflict with urbanization, etc.

The 1976 **reclamation law** came under attack from a combined mineral industry and county commissioner association cabal. They forecast that problems would arise under the act, only parts of which had been put into effect. These two groups lobbied for delays in implementation, exemptions for counties, and other weakening amendments. Lamm vetoed this bill. COSC had labeled the bill "premature."

The state would have lost its power to guarantee **minimum stream flows** if the governor hadn't vetoed another bill passed

by the legislature. Minimum stream flow rights are necessary to protect wildlife and fisheries.

A **severance tax**, which environmental lobbyists say was written by the mining industry, was passed by the 1977 legislature and became law without Lamm's signature. The bill includes a 60 cent per ton tax on coal, which is substantially lower than the coal taxes of the three other major coal producing states — Montana, North Dakota, and Wyoming. Tax credits of 50% are given for coal from underground mines and for lignite coal. There is a provision for changing the tax rate as the wholesale price index changes.

Oil shale will be taxed at four per cent, but the tax applies only to the amount left after deducting the costs of equipment, transportation, processing, and royalty payments. A 50% credit is allowed for in situ methods.

Taxes were also imposed on metallic minerals and oil and gas. Revenues will be divided among the state general fund, the state severance tax trust fund, and the local government severance tax fund. Estimated revenue from the tax will be about \$10 million.

The Colorado Open Space Council has published a Legislative Analysis which deals with all the environmental issues of the 1977 session and analyzes the voting records of the legislators. It is available from the organization at 1325 Delaware St., Denver, Colo. 80204 for \$5. During the session COSC also publishes a weekly bulletin and holds weekly meetings where representatives of COSC's member groups are invited to help form lobbying strategy for the following week. Subscriptions to the bulletin and the analysis are \$5 for COSC members and \$10 for non-members per year.



HCN Bulletin Board



LOONEY LIMERICKS

by Zane E. Cology

If you block an outfit with money,
And they start acting friendly and funny,
Hold tight to your purse!
They're about to coerce.
Beware, lest you're trapped in their honey.

ALTERNATE ENERGY EXPO

An Alternate Energy Expo will be held in Tulsa, Oklahoma, Nov. 11-13. In over 200 display booths, the expo will present the latest innovations in the fields of natural energy sources, conservation, health, education, wilderness skills, recycling, housing, and ecology. For information about renting booths, write to Liberty Enterprises, 7729 E. 21st., Tulsa, Oklahoma 74129 or phone (918) 663-2291. All booths are expected to be taken by Oct. 1.

N.D. ENERGY FAIR

A Fuel, Food, and Future Fair will be held at the Grand Forks Armory in Grand Forks, N.D., on Oct. 28-30. The fair will include from 40-60 booths with displays on such things as weatherization, alternative energy, and consumerism. For more information, contact Jerry Gallant, Quad County Community Action Agency, 2N 3rd St., Grand Forks, N.D., or call (701) 746-5431.



Wyoming Travel Commission photo
Bighorn Canyon

BIGHORN CANYON WILDERNESS

The National Park Service has completed a wilderness study and an environmental analysis of the master plan for Bighorn Canyon National Recreation Area, which lies on the Montana-Wyoming border. Four workshops will be held on the studies: Oct. 11 at Lovell, Wyo.; Oct. 12 at Hardin, Mont.; Oct. 13 at Crow Agency, Mont.; and Oct. 14 at Billings, Mont. All meetings are at 7 p.m. For exact locations or for a copy of the plan, write to Homer L. Rouse, superintendent, Bighorn Canyon National Recreation Area, Box 458, Fort Smith, Mont. 59035.

NEVADA-IDAHO POWER LINE EIS

The final environmental impact statement (EIS) concerning proposed construction of a 345 kilovolt transmission line from Nevada to Idaho is available at all Nevada BLM offices, and at the Boise, Shoshone, and Burley District offices in Idaho. Several libraries in both states have also received copies.

STRIP MINE HEARINGS

Public hearings on proposed regulations to implement the nation's new strip mining law will be held in Denver, Colo., and three other U.S. cities Sept. 20-22. The proposed regulations were published in the *Federal Register* Sept. 7. The first half-day of each

hearing will focus on the fee collection system for the Abandoned Lands Fund. The remaining two and one-half days of hearings will be devoted to the interim regulations as described in Section 502 of the new law, P.L. 95-87. To arrange for a specific time to testify contact: Mike Bradley, Office of Surface Mining, U.S. Department of Interior, Washington, D.C., (202) 343-2222. The Denver hearing will be in the Denver Public Library from 9 a.m. to 5 p.m. each day. The other hearings will be in Washington, D.C.; Charleston, W. Va.; and St. Louis, Mo.

CANYON BURRO WORKSHOP

Papers dealing with various facets of the burro problem in the Grand Canyon will be presented at a workshop that is part of the annual Grand Canyon Research Review. The workshop will be held Oct. 14 at Grand Canyon Village, Grand Canyon National Park. Representatives from the U.S. Interior Department and the U.S. Agriculture Department will present their perspectives. Individuals interested in presenting papers or others interested in attending should write Merle E. Stitt, superintendent, Grand Canyon, Ariz. 86023.





Western Roundup



Sierra Club sues over prime ag land

The Sierra Club has filed a suit in South Dakota District Court to stop two federally-financed water development projects from encouraging subdivision development on prime agricultural land. The suit seeks to enjoin the U.S. Farmers Home Administration (FmHA) from granting loans to two rural water development corporations in eastern South Dakota without first preparing environmental impact statements on the projects as required by the National Environmental Policy Act.

The club says that much of the water developed by these projects won't be used to serve farmers and ranchers as the loan program had originally intended. The water developers are planning to serve new rural subdivisions to be built on prime agricultural land. Granting loans to fund such developments isn't consistent with a U.S. Department of Agriculture policy that calls for avoiding land use decisions that

irrevocably commit prime agricultural land to nonagricultural uses, according to Bruce Hamilton, Sierra Club Northern Plains representative.

The club believes that wastes from the developments served by the project water could seriously pollute the ground water supply used by existing area residents since only septic tank sewage disposal is planned. Also, area residents and the city of Sioux Falls say the projects may deplete their ground water supply that is already in critical or short supply.

FmHA oversees a multi-billion dollar grant and loan program, but has only prepared two environmental impact statements since the law requiring them on all "major federal actions significantly affecting the quality of the human environment" was signed in 1970. A hearing on a preliminary injunction is scheduled for September 28.

Yellowstone River hearings underway

Five cities, industry and the Montana Fish and Game Commission are all eying the water from the Yellowstone River when the current moratorium on allocations from the river ends. Hearings are now underway in Montana on the water allocations, and there are more requests for water reservations than the river carries.

The city of Billings, Mont., asked for 317,456 acre-feet of water by the year 2070. This is about twice the current consumption and is based on a population increase

of 600%. Industry, mostly coal-related, is asking for 922,000 acre-feet, and fish and game 8.2 million acre-feet. The four small cities of Livingston, Big Timber, Columbus and Laurel want a total of about 35,000 acre-feet. The river carries about 8.8 million acre-feet annually, and 600,000 acre-feet have already been allocated.

The Board of Natural Resources must rule on the claims from state, local, and federal agencies by January 1, 1978. Hearings are expected to last a month or more.

Idaho wilderness compromise reached

Negotiations between environmentalists and local business and community representatives in Grangeville, Idaho, have resulted in a compromise settlement on the size of the proposed Gospel Hump wilderness. However, reaching the compromise has not silenced criticism from vested interests and politicians.

The *Idaho Statesman* reports that the compromise calls for 220,000 designated wilderness acres, 123,000 multiple use acres, and 45,000 acres for initial timber cutting. Opponents of the settlement claim that the compromise is a sell-out to the environmentalists.

Representatives of the off-road vehicle

interests and the mining interests claim that they have been excluded from negotiations. The executive secretary of the Idaho Mining Association says, "The area has excellent potential for mineral exploration," but "concessions were made under duress to the environmentalists." U.S. Rep. Steve Symms (R-Idaho) also opposes the solution. Strong support is given to the compromise from both the governor, John Evans, and local Grangeville officials, who will be most impacted by the wilderness area. Both the mayor and the head of the local Chamber of Commerce support the passage of the compromise area designation in Congress.

EDF hits Colorado River salinity rules

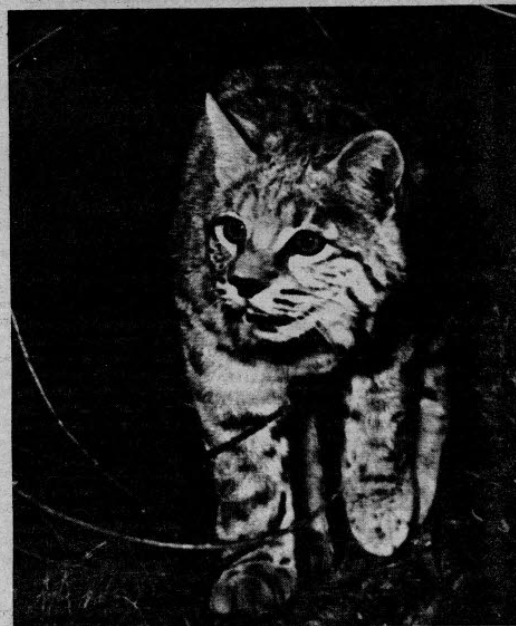
The Environmental Defense Fund (EDF) has filed a lawsuit challenging federally approved salinity standards for the Colorado River that could ultimately affect land use practices in the entire river basin.

In an effort to deal with the salinity problems in the Colorado, the Colorado River Basin Salinity Control Forum has adopted Environmental Protection Agency plans for restoring 1972 salinity levels in the river, according to the *Los Angeles Times*. EDF says, however, that the plan "concedes it will not effectively control salinity, at best, beyond 1990."

EDF lawyer George Pring says that the increase in salinity "is almost synonymous with growth and development. But, we're not trying to stop growth. We're asking for

a closer look at new development in terms of its impact on salinity in the river."

EDF is asking for "stateline" controls on salinity levels, in which each state would be responsible for the amount of salinity in the river at its border. Water agency officials say that this approach would break down the regional cooperation in controlling river salinity. Myron Holbert, chief engineer for the California Colorado River Board, says, "If you set (stateline standards), either the states could not develop or they would have to build salinity control projects to offset the impacts of development." Holbert says a regional approach is better than burdening each individual state.



Bobcat. Photo by Dick Randall. Defenders of Wildlife.

Bobcat, lynx, otter populations studied

The U.S. Fish and Wildlife Service has announced that it will undertake a review of the status of three species — the bobcat, lynx, and river otter — to determine if their populations are threatened or endangered. The study is being conducted in response to a petition submitted by the Fund for Animals.

The bobcat originally roamed throughout the lower 48 states. The species is now

hunted as a predator and killing by man and habitat loss have dramatically reduced its numbers (see HCN 1-27-77). The lynx and river otter also originally occurred throughout the U.S., but their range and numbers have been reduced as a result of trapping for pelts and excessive hunting.

Idaho has announced that it will introduce a season on hunting and trapping the bobcat and lynx, covering only the month of January, 1978.

Largest alunite heap near Colo. peak

What is reported to be the world's largest deposit of alunite, a source of aluminum, has been discovered in Colorado's high mountains.

Earth Sciences, Inc. of Golden, Colo., reports a deposit on 12,826-foot Red Mountain, between Lake City and Silverton in southwestern Colorado, that is about twice as big as the second largest known deposit of alunite. According to Earth Sciences, the Colorado deposit has a potential of some two billion tons of ore.

Earth Sciences is currently involved in developing an alunite deposit near Milford, Utah, in partnership with the Southwire and National Steel companies. That effort, called the Alumet Partnership, would be the nation's first alunite mine and processing plant.

A spokesman for Earth Sciences told the *Rocky Mountain News* that it will be a long time before the company starts thinking about developing its rich Colorado find.

New water troubles for Wyoming plant

Basin Electric Power Cooperative's Laramie River Station in Wheatland, Wyoming, has run into additional troubles with its water supplies. While the construction of the Grayrocks Dam is held up in litigation with the state of Nebraska, the company received only about half of the water it requested from deep well fields. Basin had expected to obtain 5,000 acre-feet of water annually from the irrigation and deep aquifers in Wheatland. However, tests conducted by the U.S. Geological Sur-

vey showed that the result of this level of pumping from groundwater would result in declines in groundwater levels of 5 to 40 feet over a 40 year period. Based on that data, the Wyoming state engineer authorized the pumping of only 750 acre-feet annually from the irrigation aquifers and 2,000 acre-feet from deeper aquifers not presently utilized, or about one-half of the company's request. Water supplies have been a major concern of those objecting to the plant.

14-High Country News — Sept. 9, 1977

STATE OF WYOMING PUBLIC NOTICE

PURPOSE OF PUBLIC NOTICE

THE PURPOSE OF THIS PUBLIC NOTICE IS TO STATE THE STATE OF WYOMING'S INTENTION TO ISSUE WASTEWATER DISCHARGE PERMITS UNDER THE FEDERAL WATER POLLUTION CONTROL ACT AMENDMENTS OF 1972 (FWPCA), P.L. 92-500 AND THE WYOMING ENVIRONMENTAL QUALITY ACT §§-502 et. seq., WYOMING STATUTES 1967, CUMULATIVE SUPPLEMENT 1973.

IT IS THE STATE OF WYOMING'S INTENTION TO ISSUE WASTEWATER DISCHARGE PERMITS TO (2) TWO OIL TREATER DISCHARGERS AND (1) ONE COMMERCIAL DISCHARGER, TO AMEND (1) ONE INDUSTRIAL AND (1) ONE INDUSTRIAL COMMUNITY DISCHARGE PERMIT, AND TO RENEW (1) ONE INDUSTRIAL AND (22) TWENTY-TWO OIL TREATER DISCHARGE PERMITS WITHIN THE STATE OF WYOMING.

APPLICANT INFORMATION:

(1) APPLICANT NAME: TIGER OIL COMPANY
MAILING ADDRESS: P.O. BOX 546
WILLISTON, NORTH DAKOTA 58801
FACILITY LOCATION: FEDERAL NO. 1348, SW4, SECTION 18, T27N, R77W, NATRONA COUNTY, WYOMING
APPLICATION NUMBER: WY-0027324

(2) APPLICANT NAME: AMOCO PRODUCTION COMPANY
MAILING ADDRESS: P.O. BOX 2520
CASPER, WYOMING 82601
FACILITY LOCATION: CASPER, WYOMING 82601, SECTION 21, T26N, R89W, CARBON COUNTY, WYOMING
APPLICATION NUMBER: WY-0027316

Facilities are typical oil production units located in Carbon and Natrona Counties, Wyoming. The produced water is separated from the petroleum product through the use of heater treaters and skim ponds.

A letter of beneficial use has been received from an area rancher concerning the Tiger Oil Company discharge; therefore, the limits on total dissolved solids, chlorides and sulfates have been waived. Semi-annual self-monitoring and reporting of these parameters is still required, however, along with pH 6.5 — 8.5 standard units. Oil and grease must not exceed 10 mg/l on any single grab sample and must be monitored quarterly.

The proposed Amoco permit requires that the discharge meet Wyoming's Produced Water Criteria effective immediately upon discharge. Chapter VII of Wyoming's Water Quality Regulations states that any produced water discharge is beneficially used if the total dissolved solids content is less than 5,000 mg/l.

Semi-annual self-monitoring is required for all parameters except oil and grease which must be monitored quarterly. Both discharges are to Class III waters of the State. The permits will expire July 31, 1980.

(3) APPLICANT NAME: GREEN VALLEY ESTATES
MAILING ADDRESS: c/o S & R LAND COMPANY
1709 CAREY AVENUE
CHEYENNE, WYOMING 82001
FACILITY LOCATION: NE4, SECTION 23, T52N, R73W, CAMPBELL COUNTY, WYOMING
APPLICATION NUMBER: WY-0027280

Facility is a 130 unit subdivision located northwest of Gillette, Wyoming. Sewage treatment will consist of a physical-chemical plant. Secondary treatment standards must be met immediately upon discharge for BOD5, TSS and pH. Fecal coliform limits have been set at 200 — 400/100 ml year around. Discharge will be to an unnamed stock pond in the Wildcat Creek Drainage (Class III stream). Quarterly self-monitoring and reporting is required.

(4) PERMIT NAME: LUCKY MC URANIUM CORPORATION
MAILING ADDRESS: SHIRLEY BASIN MINE
SHIRLEY BASIN, WYOMING 82615
FACILITY LOCATION: (001) — NE4, SECTION 27, T28N, R79W
(002) — SW4, SECTION 29, T28N, R79W
(003) — NE4, SECTION 2, T27N, R79W
CONVERSE COUNTY, WYOMING
PERMIT NUMBER: WY-0001252

Lucky Mc Uranium Corporation (formerly Utah International) operates a large open pit uranium mine at Shirley Basin, Wyoming. Water encountered in the pits while mining is pumped to barium chloride feed systems for precipitation of radium. The water is then routed to large ponds for settling of suspended matter before being discharged to Spring Creek (Class II stream) or the Little Medicine Bow River (Class I stream).

The Company has requested that the permit be modified to include a third point of discharge. Eventually only two discharge points will be active and the original discharge point (001) will be inactivated. In addition to allowing another point of discharge, the permit has been modified to limit dissolved radium rather than total radium. The reason for this change is that the U.S. Environmental Protection Agency recently informed the Department that effluent regulations on uranium mines will soon be issued with that modification.

The proposed permit requires compliance with National Best Practicable Treatment Standards for uranium mining. Self-monitoring reports must be submitted monthly and the permit will expire September 30, 1982.

(5) PERMIT NAME: AMOCO PRODUCTION COMPANY
MAILING ADDRESS: "BAIROIL, WYOMING"
P.O. BOX 1400
RIVERTON, WYOMING 82501
PERMIT NUMBER: WY-0021075

The Town of Bairol, Wyoming, is an industrial community owned and operated by Amoco Production Company. The Town has a 2-lagoon system — discharge point 001 is from the oil lagoon serving the south side of Town and discharge point 002 is from the new lagoon serving the north side of Town. Both lagoons are designed for complete containment.

Modified permit requires compliance with National Secondary Treatment Standards effective immediately and submission of self-monitoring data on a quarterly basis. The permit will expire September 30, 1982.

(6) PERMIT NAME: AMOCO PRODUCTION COMPANY
MAILING ADDRESS: P.O. BOX 1400
RIVERTON, WYOMING 82501
FACILITY LOCATION: BEAVER CREEK GAS PLANT,
SECTION 10, T33N, R96W,
FREMONT COUNTY, WYOMING
PERMIT NUMBER: WY-0000248

Facility extracts natural gas liquids and sulfur from natural gas. The plant is water cooled and wastewater consists of approximately 4,200 gallons per day (gpd) of produced water and 4,200 gpd of cooling tower blowdown. Under normal conditions all of this water is reinjected for the purpose of

secondary oil recovery, however, under emergency conditions, this water is routed to a 2 cell skimming pond which could discharge to Beaver Creek (Class I stream).

Proposed permit requires that any discharge to Beaver Creek meet effluent conditions considered to be "best practicable" by the State of Wyoming. The permittee must monitor the quality and quantity of any discharge and the results must be reported on a quarterly basis. The permit will expire March 31, 1980.

(7) PERMIT NAME: ALTEX OIL CORPORATION
MAILING ADDRESS: 640 GUARANTY BANK BUILDING
817 — 17th STREET
DENVER, COLORADO 80202
FACILITY LOCATION: BARRETT 2850 TANK BATTERY,
SW4, SECTION 20, T31N, R89W,
BIG HORN COUNTY, WYOMING
PERMIT NUMBER: WY-0022772

(8) PERMIT NAME: AMOCO PRODUCTION COMPANY
MAILING ADDRESS: P.O. BOX 589
POWELL, WYOMING 82435
FACILITY LOCATION: TORCHLIGHT FIELD, SW4,
SECTION 25, T31N, R89W,
BIG HORN COUNTY, WYOMING
PERMIT NUMBER: WY-0002721

(9) PERMIT NAME: FOURSEAS MIDDLE DOME BATTERY,
SW4, SECTION 4, T26N, R89W,
PARK COUNTY, WYOMING
PERMIT NUMBER: WY-0002638

(10) PERMIT NAME: ASHLAND EXPLORATION COMPANY
MAILING ADDRESS: P.O. BOX 75
HAMILTON DOME, WYOMING 82427
FACILITY LOCATION: PACIFIC WESTERN LIFE BUILDING
SEW, SECTION 11, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0000515

(11) PERMIT NAME: HAMILTON DOME TANK BATTERY 04417,
SW4, SECTION 11, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0000497

(12) PERMIT NAME: ATLANTIC RICHFIELD COMPANY
MAILING ADDRESS: 1860 LINCOLN STREET, SUITE 501
LINCOLN CENTER, SUITE 1100
HOT SPRINGS COUNTY, WYOMING
FACILITY LOCATION: HAMILTON DOME FIELD, NE4, NE4,
SECTION 13, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0000329

(13) PERMIT NAME: CONTINENTAL OIL COMPANY
MAILING ADDRESS: PACIFIC WESTERN LIFE BUILDING
132 NORTH DUBUIN
DENVER, WYOMING 80201
FACILITY LOCATION: GERO UNIT BATTERY, NE4,
SECTION 23, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0001031

(14) PERMIT NAME: GORDON CONSTRUCTION COMPANY
MAILING ADDRESS: LINCOLN CENTER, SUITE 1100
1860 LINCOLN STREET
DENVER, COLORADO 80201
FACILITY LOCATION: WAGONWHEEL FIELD, CHRISTENSEN NE. 1
LEASE, NE4, SECTION 4, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0002054

(15) PERMIT NAME: HUSKEY OIL COMPANY
MAILING ADDRESS: P.O. BOX 386
CODY, WYOMING 82414
FACILITY LOCATION: PITCHFORK UNIT NE4,
SECTION 14, T46N, R89W,
PARK COUNTY, WYOMING
PERMIT NUMBER: WY-0006890

(16) PERMIT NAME: DAYZ LEASE NE4,
SECTION 3, T46N, R89W,
BIG HORN COUNTY, WYOMING
PERMIT NUMBER: WY-0000343

(17) PERMIT NAME: J-W OPERATING COMPANY
MAILING ADDRESS: P.O. BOX 188
MAGNOLIA, ARKANSAS 71353
FACILITY LOCATION: SHEEP POINT FIELD, SECTION 16, T47N, R10W,
PARK COUNTY, WYOMING
PERMIT NUMBER: WY-0000986

(18) PERMIT NAME: WILLIAM C. KIRKWOOD OIL AND GAS
MAILING ADDRESS: SUITE 201, GOODFRIEND BUILDING
CASPER, WYOMING 82601
FACILITY LOCATION: COWLEY FIELD DALTON LEASE, NW4,
NE4, SECTION 34, T27N, R87W,
BIG HORN COUNTY, WYOMING
PERMIT NUMBER: WY-0001228

(19) PERMIT NAME: MARATHON OIL COMPANY
MAILING ADDRESS: P.O. BOX 120
CASPER, WYOMING 82601
FACILITY LOCATION: WALKER DOME FIELD, SMITH 4E BATTERY,
SW4, SECTION 8, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0002609

(20) PERMIT NAME: WALKER DOME FIELD, SMITH 8E BATTERY,
SW4, SECTION 8, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0002615

(21) PERMIT NAME: WALKER DOME FIELD, SMITH 8E — 8F
BATTERY, NW4, SECTION 8, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0002683

(22) PERMIT NAME: WALKER DOME FIELD, SMITH 6F BATTERY,
NW4, SECTION 8, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0002691

(23) PERMIT NAME: M & K OIL OPERATIONS
MAILING ADDRESS: P.O. BOX 1497
CASPER, WYOMING 82601
FACILITY LOCATION: WHIT SAGE CREEK FIELD, EMMETT LEASE,
NE4, SW4, SECTION 14, T46N, R89W,
PARK COUNTY, WYOMING
PERMIT NUMBER: WY-0002643

(24) PERMIT NAME: OIL DEVELOPMENT COMPANY OF TEXAS
MAILING ADDRESS: P.O. BOX 990
THERMOPOLIS, WYOMING 82443
FACILITY LOCATION: HAMILTON DOME FIELD, TANK BATTERY
A, SW4, SECTION 7, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0001259

(25) PERMIT NAME: PBM OIL COMPANY
MAILING ADDRESS: MEETREESE, WYOMING 82453
FACILITY LOCATION: FEDERAL OGLE NO. 1 AND NO. 2 BATTERY,
SW4, SECTION 13, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0003388

(26) PERMIT NAME: PHILLIPS PETROLEUM COMPANY
MAILING ADDRESS: P.O. BOX 2925
CASPER, WYOMING 82601
FACILITY LOCATION: GOLDEN EAGLE LEASE, TANK BATTERY
NO. 1, SW4, SECTION 11, T46N, R89W,
HOT SPRINGS COUNTY, WYOMING
PERMIT NUMBER: WY-0001279

(27) PERMIT NAME: TERRA RESOURCES
MAILING ADDRESS: P.O. BOX 2900
CASPER, WYOMING 82601
FACILITY LOCATION: COWLEY FIELD DUNFORD,
NW4, SECTION 25, T27N, R87W,
BIG HORN COUNTY, WYOMING
PERMIT NUMBER: WY-0001340

Facilities are standard oil production units located in Big Horn, Park, Hot Springs and Fremont Counties, Wyoming. The produced water is brought to the surface and separated from the petroleum product through the use of heater treaters and skim ponds. All facilities discharge to Class III waters of the State with the exceptions of Amoco WY-0025038, Arco WY-0020338, Husky WY-0026590, J-W Operating, M & K Oil and the four Marathon facilities, which discharge to unnamed drainages of Class I waters, and the Terra and William Kirkwood facilities which discharge directly to Class I streams.

All facilities must meet Wyoming's Produced Water Criteria effective immediately, with the exception of the four Marathon discharges which have been given total dissolved solids limits of 7,500 mg/l and chloride limits of 3,000 mg/l. The rationale for higher limits on these parameters is based on the extremely low flow of the discharges.

A letter of beneficial use has been received by an area rancher concerning the discharge from the PBM facility; therefore, limits on the chemical parameters have been waived (total dissolved solids, chloride and sulfate). However, these parameters must still be monitored and reported semi-annually. The oil and grease limit of 10 mg/l and pH of 6.5 — 8.5 standard units will remain in effect also.

Terra Resources and William C. Kirkwood have been given limits on dissolved sulfides of 5.0 mg/l, since the discharges are direct to Class I streams (Sage and Potawat Creek).

Semi-annual self-monitoring is required for all parameters except oil and grease which must be monitored quarterly.

The expiration dates for the permits correspond to the expiration dates of other oil treater facilities in the same area.

Chapter VII of Wyoming's Water Quality Regulations states that every produced water discharge is beneficially used if the total dissolved solids content is 5,000 mg/l or less.

STATE-EPA TENTATIVE DETERMINATIONS

Tentative determinations have been made by the State of Wyoming in cooperation with the EPA staff relative to effluent limitations and conditions to be imposed on the permits. These limitations and conditions will assure that State water quality standards and applicable provisions of the FWPCA will be protected.

PUBLIC COMMENTS

Public comments are invited any time prior to October 9, 1977. Comments may be directed to the Wyoming Department of Environmental Quality, Water Quality Division, Permit Section, Hathaway Building, Cheyenne, Wyoming 82002, or the U.S. Environmental Protection Agency, Region VIII, 1860 Lincoln Street, Denver, Colorado 80203. All comments received prior to October 9, 1977 will be considered in the formulation of final determinations to be imposed on the permits.

ADDITIONAL INFORMATION

Additional information may be obtained upon request by calling the State of Wyoming, (307) 777-7781, or EPA, (303) 327-3874, or by writing to the aforementioned addresses.

The complete applications, draft permits and related documents are available for review and reproduction at the aforementioned addresses.

Public Notice No. WY-77-011

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DISTAFF CORNER

by Myra Connell

A MISERABLE BIRD

One hundred forty-one magpies were counted by the local Audubon group in the 1976 annual bird count within a 7½-mile radius of the High Country News office. Black-billed magpies were outnumbered by only two species — starlings and waxwings. If other localities within the magpie's range, (Alaska to eastern and central California and eastward to Kansas) are similarly supplied, the West is blessed (cursed?) with multitudes of the graceful creatures.

These facts stimulated questions in my inquiring mind: Why are magpies so numerous? What animal is their natural enemy? Why are they despised, maligned, accused by ranchers of crimes, and persecuted?

The first stop on my quest for answers was the County Agricultural Extension office. Among the hundreds of bulletins published by a department famous for tracts on

everything from snow fleas to buffalo, there was not one paragraph on magpies.

The County Weed and Pest Control office likewise yielded no printed information. The person in charge there stated unequivocally that magpies pick sores on cattle and peck calves' eyes out. She said that the campaign against them has been discontinued because they have been placed on the federal list of migratory birds through the United States' agreement with Mexico. She declared that magpies are not migratory and summed up by saying that the magpie is a "miserable bird."

Every book on Western birds in the public library discussed magpies, but not one mentioned their natural enemies. I did find out that the black-billed magpie is found throughout Eurasia as well as in America. He has stirred people's imaginations and tempers for centuries. In English folklore he is a bird of omen as shown by the jingle "1 magpie for sorrow, 2 for mirth, 3 for a wedding, 4 for birth, 5 for silver, 6 for gold, 7 for a secret not to be told; 8 for heaven, 9 for hell, and 10 for the devil's own self."



Black-billed magpie

(Alexander Wetmore, *Song and Garden Birds of North America*).

Prejudice against the magpie and his cousins, ravens, jays, and crows, dates at least from the Middle Ages. In Northern European folklore "members of this tribe were considered "devil's birds," and the magpie was thought to have devil's blood on his tongue.

One might wonder which of the various crimes laid to the magpie by Western ranchers are also folklore.

Obviously, most of my questions remain unanswered.

Magpies appeal to me because they are so human. As with people, surely among their bad traits some redeeming good can be found.

Eavesdropper

environmental news from around the world

SIR, YOUR HOUSE IS LEAKING. The Los Angeles Times reports that the Carter Administration is considering establishing a "youth energy detective" program, using youngsters going from house to house to see how well their neighbors are conserving energy. Under the volunteer program, high school students or other young people would go around their neighborhoods, inspect houses for energy efficiency, and check off energy problems on a government prepared checklist. Greg Schneiders, White House projects director, says, according to the Times, "It's more of a list of tips on how to conserve energy in the home. The information is not going to be sent anywhere. The thing that I want to avoid, obviously, is the implication that an army of little uniformed inspectors are going out and checking on people." Response to the idea from educators has been favorable, but critics have compared it to former President Gerald Ford's ill-fated Whip Inflation Now (WIN) program.

PESTICIDE TEST DEFICIENCIES. The Environmental Protection Agency says that "significant" test deficiencies raise questions about 123 pesticide products now considered safe that may actually pose serious health threats. EPA investigators found defects in the way toxicology studies were performed and discrepancies between the raw test data and the information submitted to the government. The potentially hazardous products include captan, paraquat, naled, ronnel, phosalone, thiram, and methoprene.

ENVIRONMENT DEPARTMENT PROPOSED. President Jimmy Carter has ordered the Office of Management and Budget to study the establishment of a super environment agency, parallel to the newly-created Department of Energy, according to *Public Lands News*. Under existing law, Carter has the authority to put together such a reorganization, which could combine the Interior Department,

Environmental Protection Agency, Corps of Engineers, the National Oceanic and Atmospheric Administration, and perhaps the Forest Service.

POLLUTION IMPAIRS CROP PRODUCTION. Douglas M. Costle, Environmental Protection Agency administrator, says air pollution is costing the nation "millions of dollars a year in reduced agricultural productivity." According to a study conducted by the Boyce Thompson Institute for Plant Research in New York, alfalfa and sweet corn yields were lowered by 15% after exposure to smog. Similar experiments show bean production reduced by 25% and tomato production by 33% when exposed to air pollution. Costle encouraged greater cooperation between farmers and environmentalists, since "we share a common concern for protecting our soil, for preserving clean water, and for preventing pollution of our air."

WATER CONSERVATION INCENTIVE. The Environmental Protection Agency (EPA) is baiting cities with a \$45 billion program to finance 75% of municipal sewage plants over the next 10 years, but only if the cities reduce their water use by 15%. If cities don't cut their water use, the EPA will fund only 70% of the plants, according to the *Washington Post*. The Carter administration backed the proposal through legislation which would penalize cities and towns refusing to restrict water use. U.S. Sen. Wendell Anderson (D-Minn.) suggested that innovative sewage treatment plans be given priority funding, to steer away from archaic forms of disposal and recycling.



BIRD HANGING FROM SKY BAND

Sept. 9, 1977 — High Country News-15

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Classifieds

THE COLORADO CONSERVATION FUND, a newly established non-profit organization, seeks a full-time executive director to be responsible for the development and implementation of fund raising programs for a wide variety of environmental concerns. Applicants must demonstrate a degree of experience in the development and implementation of such programs, a high degree of initiative, judgment and imagination, skill and interpersonal relations, and commitment to environmental activities. Salary: \$12,000 to \$15,000. Submit application letter, resume, and references to: Colorado Conservation Fund, 2239 East Colfax, Denver, CO 80206.

"CANYON COUNTRY HIKING AND NATURAL HISTORY." Barnes. 176 pages, illustrated, \$3.95ppd. Hiking trails and routes in southeastern Utah. F. A. Barnes, Box 963, Moab, Utah 84532.

POSITIONS AVAILABLE. The Idaho Conservation League, a citizens' organization, is accepting applications for the following positions: a field organizer in North Idaho, two community educators in South-central Idaho, a researcher for Idaho energy and utility issues in Boise, and an office manager in Boise. ICL is a grass roots organization whose primary purpose is to involve citizens in the decision making process for state and local issues.

Job descriptions will be sent to interested persons on request. To apply, send resume with references to ICL, P.O. Box 844, Boise, Idaho 83701 (208) 345-6933 as soon as possible. Please indicate for which position you are applying.

ALTERNATE ENERGY EXPO 77 will be held at Expo Square in Tulsa, Okla., Nov. 11, 12, & 13, 1977. The Expo will be a people centered event geared to educate all of us on ways to improve our lives and our environment. It will present the latest innovations in the fields of solar, wind, wood, methane, etc. The expo will also focus on conservation of energy, health, ecology, education, wilderness skills & much more. This exposition will be the largest of its kind ever held in the Midwest, with over 200 display booths and parking facilities for 25,000 cars. For further information, contact Ron Surface, Liberty Enterprises, Inc. 7729 E. 21st., Tulsa, Okla. 74129 918-663-2291.

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grows and you begin to
understand it.



ANN ZWINGER

by Joan Plice
Drawings by Ann Zwinger

Ann Zwinger is the patient master of many disciplines. She is an artist, a writer, a naturalist, and in recent years a river runner. She has floated every navigable mile of the Green River, from its source in the Wind River Mountains in Wyoming to its confluence with the Colorado River in Utah.

She's among those who know it best — and has shared her knowledge in a book, *Run, River, Run*. Sponsored by Thorne Ecological Institute, she led a group down Desolation and Gray Canyons on the Green this summer (see story, p. 1).

Quietly, Zwinger encouraged people on the trip to try their hand at sketching, if only as a tool to refine their ability to see. Among the rewards of the effort, she promised, would be vivid mental pictures of the



trip. She warned people not to be impatient about the quality of their products.

"You don't expect to sit down at the piano and play a Grieg concerto without practice. But for some reason people think they should just be able to sit down and draw. If they can't, they give up, because they don't think they have talent."

Drawing well, she believes, is mainly a matter of practice, of "strengthening the connection between the eye and the arm."

Zwinger's writing sparkles with keen observation and reflects the strong influence of art and its tradition. The silt patterns on the surface of the water look like marble to her. A moon and its reflection on the water remind her of the work of American painter Albert Pinkham Ryder. Fremont cottonwood leaves are "a satisfying triangle, round-notched, strongly veined, a unifying green neither warm nor cool but perfect with blue sky and putty river." *Run, River, Run* so effectively recorded the natural and cultural history of the Green, as well as the adventure of exploring it by boat, that it received the John Burroughs medal for nature writing in 1976.

While she has come to love free-flowing streams, she's developed a resentment for

reservoirs. A grueling day she spent paddling in a stiff headwind across Fontenelle Reservoir on the Green is still a vivid memory.

"When I go to hell, at one level, I'll be paddling my canoe across a reservoir," she predicts.

She also resents tamarisk, a lacy-looking tree introduced to the U.S. by man that is choking out native species along the banks of the Colorado and the Green.

She has written and illustrated two other books: *Land Above the Trees*, which she co-authored with Beatrice Willard, and *Beyond the Aspen Grove*.

Still entranced by the power and gentleness of Western rivers, she's now at work on a book about the San Juan, another tributary of the Colorado.

Drawing continues to add dimension to her experience and her writing.

"Life is never quite the same after you see something," she says. "You begin to see how it grows and you begin to understand it."



Dear Friends,

The summer is over, and we are all back from our vacations, ready to tackle the baskets of clippings, letters, and newsletters waiting at our desks. Fortunately, thanks to some of you, there are some real day-brighteners hidden in the stacks and in the letters you've sent us throughout the summer.

There was the note from Jack Pugh of Green River, Wyo., who volunteered to help August by typing labels for our promotion work. As it turned out, Jack turned the task over to his 13-year-old daughter who, at 10 cents a label, was eager to proceed — even after she broke her arm and had to do them one-handed. Thanks to both of them and to Andrae King out in California who also volunteered to type labels for us.

Then Raymond and Mary-Jane Parker wrote to us to say they had mentioned us in their wills, leaving us a good sum (unless they live long enough to spend it all, they added). May they live forever — their faith in us will keep us going for a long time even if the money never comes.

A couple of vacationers, David Stenger and Douglas Dailer, showed up early in August when half of the staff had already left for vacations. To their surprise, they found themselves quickly put to work by August Dailer as mail sorters and address labelers.

An invaluable act of goodwill this

summer came from the Northern Rockies Action Group, which sent us Adam McLane. Adam spent a day and a half in July sharing his accounting and promotion skills with us. He holds an MBA in accounting from Stanford and a BA in American history from Williams College. From 1972 to 1976 he served as

business manager for Zero Population Growth.

While here, he schemed with August about ways to find new subscribers by letting more people know about HCN. All of us tend to stammer and apologize when we ask for money, but he came up with what we hope will be straightforward, take'em or leave'em, funding pleas — you'll be the judge. He showed us more sophisticated budgeting methods and checked out our accounting system.

He also helped us prepare a realistic budget for a grant proposal application, so we wouldn't find ourselves caught short when it came to implementing all our wonderful ideas.

Fortunately, he found some things we were doing right, too. And when he had suggestions, he was gentle — a trait we appreciated.

His summer contribution will be with us — and benefiting you — for a long while.

We continue to get letters from readers asking how they can help us get the word out. Right now we're most interested in getting lists of names and addresses. So if you belong to an organization whose members might be interested in HCN or attend a workshop and have a list of participants, send

them to August and he'll find someone to type the labels so we can send sample copies. Also, if you're attending a conference, let us know and we'll send you a stack of papers to distribute to people there.

With school starting up, we sometimes get requests from teachers who would like their students to use HCN as part of their material. We would be glad to tell you about our bulk rates, which are designed to make that feasible.

—the editors

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