TROUBLED WATERS—
TROUBLED LANDS

Judith Redmond
California Institute for Rural Studies

Since its founding in 1977, the California Institute for Rural Studies (CIRS) has been dedicated to the study of farm structure and ownership, farm labor and rural poverty, and problems associated with agriculture's dependence on toxic chemicals. CIRS is a non-profit organization conducting research and education. We rely upon your tax-deductible contributions to continue our work.

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"A new spirit of restlessness and challenge may be gathering, and it may acquire sufficient momentum to force radical changes in the western water empire. Beginning in the 1960's, a generation of protesters came on the scene, and their questioning mood spread to the larger, older population. Many ordinary citizens learned to speak out against the principles and powers governing the modern industrial apparatus, to dispute the creed of unending reign of expertise and profit. So clamourous have the protests been at times that the hierarchists have become deeply worried, gloomily warning of impending catastrophe if people do not settle down."

--Donald Worster, *Rivers of Empire*, 1985

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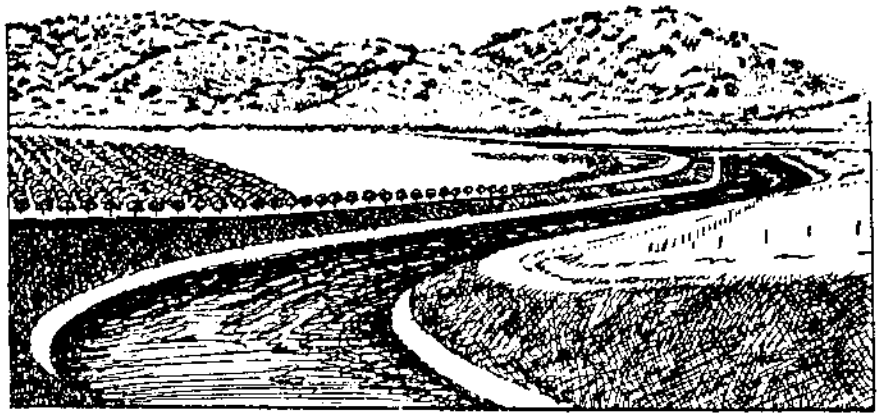


Imagine a huge, fertile valley that lacks only water to turn its ideal climate and deep soils into a cornucopia of grains, fibers, fruits, vegetables, herbs and crops of all kinds. Visionaries at the turn of the century saw many such valleys in the western U.S. where they predicted that water would bring wealth and prosperity to tens of thousands of farm families. The irrigation projects that dominate most western rivers have achieved part of this vision. Water is stored and channelled to the farms where it is needed for irrigation, and crop yields and diversity in some areas are astounding.

But the visionaries of today say that part of the dream was lost:

* A few huge farms in the west, bigger than anywhere else in the world, are getting irrigation water from the federal Bureau of Reclamation at bargain basement prices.
* Many family farms find that the market for their products is depressed, making it hard for them to survive in a farm economy that is now dominated by a few large operations.
* Residents of some farm areas fear for their future. Toxics problems, unemployment, poverty and lack of many basic services such as health care dominate their lives.
* Farm water drainage problems, soil salinity buildup, ground water pollution and toxic pesticides wreak havoc on the environment surrounding agriculture, even though many farmers say that the nature of

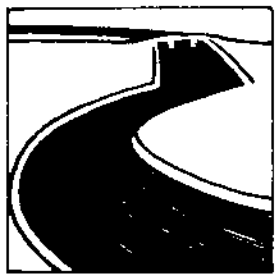
their work makes them care for the environment more than most people.

What has happened?

A coalition of farmers, environmentalists, rural residents and researchers believe that some of these problems have been caused by policies of the U.S. Bureau of Reclamation (BOR) in concert with a powerful lobby of large-scale farming interests. The Bureau was established by Congress to finance and construct irrigation projects in the arid west. Because Congress wanted to target the benefits to family farmers, current law specifies that landowners can receive subsidized irrigation water only on their farms of 960 acres or less. Larger farms, according to the law, should pay the full cost of their water. Prior to 1982, the law also required that the subsidized water only be delivered to farmers that lived on their farms. However, pressure from large farmers successfully eliminated this provision.

A recent study by the California Institute for Rural Studies (CIRS) demonstrates that irrigation projects have been managed to benefit large landholders to the direct detriment of smaller ones. The study focuses on a large district in the Central Valley of California and charges that some of the area's largest landholders have engaged in misleading and deceitful practices to circumvent the intent of Congress.

CHEAP WATER TO LARGE FARMS



The CIRS study[1] focused on the 603,000 acre Westlands Water District (WWD), which is the largest single recipient of Bureau water in the U.S. WWD data indicated that 281 new farms had formed in the District in the period 1980 - 1987 (a period during which supposedly stricter reclamation rules were being enforced). This increase of almost 100% was supposedly accompanied by a decrease in the average size of farms (described by WWD as "precipitous") from an average of 1,827 acres in 1980 to 868 acres in 1987. The CIRS

1) For details of the CIRS study see *Missed Opportunities, Squandered Resources – Why prosperity brought by water dosn't trickle down in the California Central Valley*. Published by CIRS, P.O. Box 530, Davis, CA 95617. Documentation of the points made in this booklet is available there.

study shows that what actually happened was that large farms broke up on paper into 960 acre pieces, while continuing to function as one farm to benefit only a few individuals.

In one example documented in the CIRS study, eight water users signed up for deliveries from WWD (see Table 1) using different names, but the same phone number and address. As represented to the WWD and the BOR, each was a separate farm, eligible for low-cost irrigation water. In all, they encompassed 10,075 acres. **Examination of documents at the Fresno County Agricultural Commissioner's office showed that actually, only one of the entities, California Valley Land Company, managed the entire 10,075 acres.**

Table 1. Entities in the California Valley Land Co. Cluster.

	Water User	Acres
1.	Bancroft Farming Co.	1,080
2.	California Valley Land Co.	49
3.	Graves Farming Co.	929
4.	J.L. and B.M. Woolf	1,191
5.	Saginaw Farming Co.	975
6.	Stuart Farming Co.	998
7.	Wilson Farming Co.	974
8.	Woolf Farming Co.	3,879
	TOTAL:	10,075

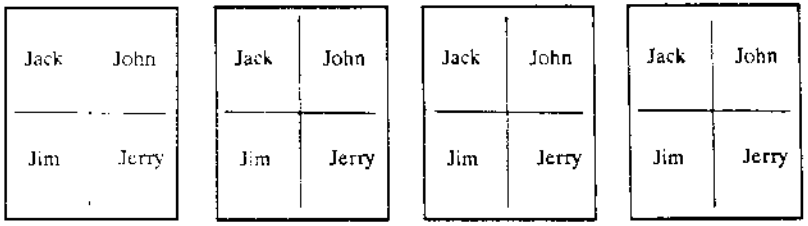
Five of the water users were business partnerships. All filed statements listing their business partners at the Fresno County Clerk's office on the same day (4/30/87). Each of the statements was signed by John L. Woolf III, a general partner, and all five listed the exact same six partners, mostly members of the Woolf family. The other three water users had different principals, but were clearly related, as the majority were also Woolf family members.

A deed of trust dated 1/29/87 indicates even more strongly the close relationship between the eight entities in this cluster. The deed describes a production loan of 5.4 million dollars from Travelers Insurance Company of Connecticut to several of the entities, including the manager, California Valley Land Company. In addition to the water users, debtors

listed on the document include six members of the Woolf family. The loan is secured by several pieces of land in WWD owned by various members of the family and operated by this cluster of water users. The deed was signed by all but one of the principals that controlled the eight water users.

The deed specified that the Woolfs would keep all of "the land in a high state of cultivation and production". Additional clauses restricting building improvements and other aspects of farm management emphasized that the property of the debtors **would be managed jointly** -- not as eight "farms". The CIRS report describes 13 similar water-user clusters.[2]

PATTERNS OF FARM MANAGEMENT ARRANGEMENT
IN WESTLANDS WATER DISTRICT

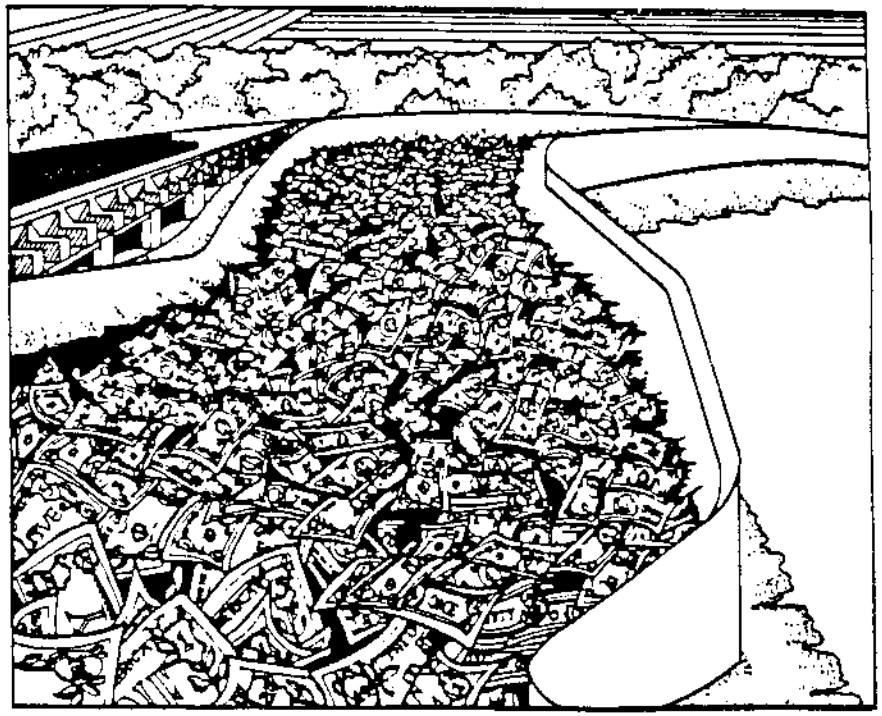


Farm 1: 960 acres Farm 2: 960 acres Farm 3: 960 acres Farm 4: 960 acres

All 3,840 acres managed by Jack, John, Jim and Jerry as one farm and irrigated with low-cost water!

The individuals Jack, John, Jim and Jerry form four 960 acre farms and call them Farms 1, 2, 3 and 4. Jack, John, Jim and Jerry are equal partners in each of the four farm businesses and each partner's 1/4 undivided interest in each farm entitles them to 240 acres (1/4 of 960) worth of low-cost water per farm, or a total of 960 acres each. The partners form a management company and hire it to manage all four farms. Again, Jack, John, Jim and Jerry are equal partners in the management company which irrigates the entire 3,840 acres with low-cost water.

2) A Nov. 1988 report by the U.S. General Accounting Office confirmed that abuse of reclamation law needed attention and confirmed the findings of the CIRS study.



Analysis of water user clusters such as this one revealed 50 clusters involving almost half of the land in WWD operated under the 960 acre limit. In other words, well over 200,000 acres of land in just this one district were receiving subsidized water even though their farm operations were large -- an average of 4,260 acres each.

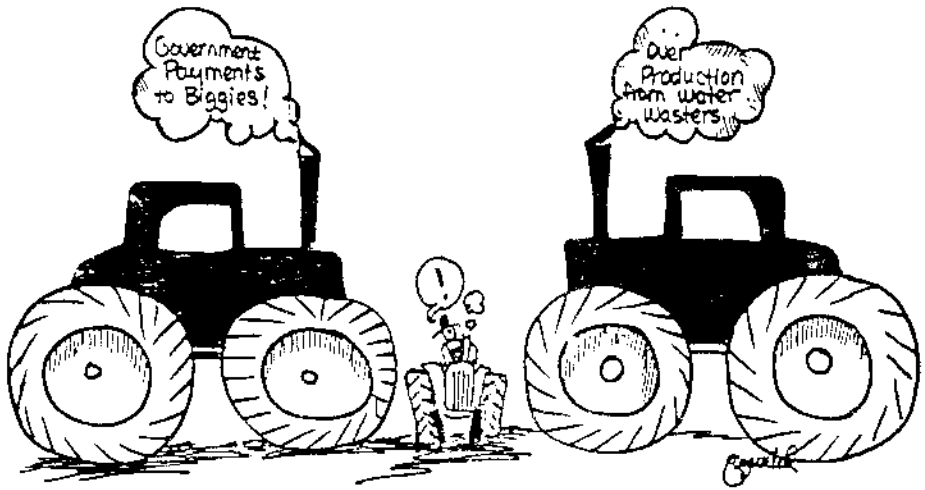
On the other hand, although a small number of farm operations are abusing reclamation law, **the majority (70%) of the farms in WWD are legitimate recipients of the subsidy.** This majority operates farms less than or equal to 960 acres but controls only 25% of the land in the district.

This pattern, in which many acres are managed as a unit even though principals in the farm business represent themselves to the Bureau as separate "farms" eligible for subsidized water, is clearly in opposition to the intent of reclamation law to spread the benefits as widely as possible. Although each of the water users can receive low-cost, subsidized water from the Bureau, the entire acreage is actually operated as one unit and the benefits accrue to only a few individuals.

An attorney for WWD has publicly confirmed that such schemes exist and claims that they are legal under BOR rules. However, in other areas of the state, water district managers have reported that family farmers in their districts don't even think that they can share equipment with their neighbors under the current rules. Such contrasting enforcement makes family farmers in small districts feel caught in the middle no matter what the law says.

COMPETITION BETWEEN LARGE AND SMALL-SCALE FARMS

The large farms go to a great deal of trouble to receive their irrigation water at subsidized prices. This is not surprising in light of estimates that the subsidy in the WWD amounts to between $100 and $217 per acre, a substantial fraction of profits.



Policies of the BOR which allow large farms to receive subsidies intended for small-scale farms have an effect on the structure of agriculture. As farm size has tended to increase over the latter half of the 20th century, increasing rivalry has emerged between very large "industrial" farms and smaller-scale farms. Larger farms are able to capture a number of advantages: reduced interest costs, volume discounts on purchased inputs, and easier access to capital. Thus, simply because of their size, the cost of doing business may be lowered.

"FARM GATE"

Wade Hill is a 62 year-old farmer who grows potatoes, wheat and lettuce on a 160 acre farm in the San Luis Valley of Colorado. His farm is irrigated by privately funded water projects that receive water from melting snow in the San Juan mountains on the west and the Sangre De Cristo mountains on the east. But now, BOR is nearing completion of the $100 million Closed Basin Project in the San Luis Valley. This project will make more water available even though the dams and diversion systems already in place are not being fully utilized.

Hill is concerned about BOR policies which he feels have contributed to overproduction of farm commodities and have stifled the farm economy in the San Luis Valley. According to Hill, "The problem in agriculture is overproduction which results in depressed prices for crops produced in the San Luis Valley. Areas irrigated by Bureau projects are receiving tax-free benefits in the form of expensive irrigation water sold for a small percentage of the actual cost." Hill calls it "Farm Gate" and maintains that it will be bigger than Watergate when the politicians finally wake up and pay attention.

Large areas of highly productive irrigated land in California have dramatically changed the market dynamics in several crop industries. For example, as huge almond plantings came into production in the 1980's, the almond market was depressed for several years, resulting in widespread losses among smaller-scale producers. As large plantings of processing tomatoes were planted in Fresno County, growers in other states and in other California counties found that they could no longer grow the crop.

In the wine grape industry, as a result of new plantings, especially very large ones in the San Joaquin Valley, bearing acreage in California increased from 150,000 acres in 1973 to 315,000 acres by 1977. As in the case of olives and almonds, increased supplies eventually led to reduced prices. Very large vineyards, such as those owned by Getty Oil Co., protected themselves by signing long-term contracts with wineries that established price floors irrespective of market conditions. Since the main grape variety planted in the San Joaquin Valley is Thompson seedless, a variety that can be crushed for wine or dried for raisins, the raisin industry was also eventually affected. In both industries, increased foreign competition also played a role. Regardless of cause, small-scale producers bore the brunt of competition from large-scale farms.

Water projects and the development of new acreage for crop production, played a pivotal role in these matters. Under the California State Water Project and the Federal Reclamation projects, irrigated acreage in the Central Valley has doubled over the past 40 years. Development of irrigated cropland requires substantial investments for water distribution systems, new farming equipment, and capital reserves to finance operations for several years while the new farming system is placed into production.

Thus, in the development of arid land for irrigated farming, there is a comparative advantage in having substantial capital resources. It is this pressure that contributes to forcing farm size to increase as land is developed. When combined with weak or non-existent enforcement of acreage limitations under reclamation programs, it is hardly surprising that average farm size has increased sharply as California land has been placed into irrigated production.

THE EFFECT ON RURAL COMMUNITIES

In their arguments favoring development of the California Central Valley Project, BOR boldly predicted that not only would the Project increase irrigated land in the valley by almost 250%, the number of farms would almost double. While their prediction for the increase in irrigated acreage was right on target, there was a 30% decline in the number of farms.

The dominance of large-scale farms has an impact on surrounding communities. During the farm crisis of the 1980's, when thousands of midwest family farms went under, large farm management companies began to operate the land. Nearby communities suffered the results in the form of bank closures, shuttered stores and abandoned homes. Various researchers have documented what others have observed: Communities near large farms tend to have inferior social conditions, as measured by such parameters as median household income and proportion of the population in poverty. This aspect of farm structure is reflected in the sense amongst rural residents that Central Valley communities are no longer functioning in a viable way.

WWD claims that 281 "new farms" were created from the breakdown

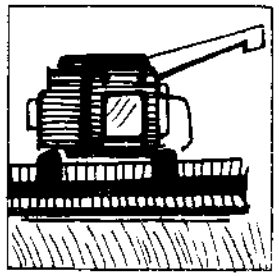
of large farms in their District. If these "farms" are, as defined in *Websters Dictionary* "a piece of land with house, barns, etc. on which crops or animals are raised", they might have added a great deal to the character of the area. However, examination of census tracts which overlap WWD and include the town of Firebaugh, 10 miles northwest of the district boundary, showed that **only a net total of 18 building permits were given for single family dwellings during the three years 1985, 1986 and 1987 during which the farm restructuring in WWD occurred.** Clearly, very few new families settled in WWD or surrounding areas during the creation of these "new farms."

WWD is home to only two communities, Cantua Creek and Huron. A few more are located at the edge of the district. Median family income in Cantua Creek and Huron is roughly 35 - 45% below the median for the State of California. The proportion of Hispanics in the population of the communities ranges from 79.2% to 91.4%. The largest single source of employment is farm work. These are communities based on hired farm laborers.

The control of land and water resources by a small number of individuals who depend on a disenfranchised class of low-paid laborers is counter to the democratic ideal. This is reflected in the way that Boards of Directors of many of the Valley's water districts are elected. Instead of one vote per registered voter, **these districts apportion votes based on appraised value of land owned** in the district. Since Southern Pacific Land Co. owns 81,200 acres in WWD, they get roughly 13% of the total votes in the 603,000 acre district!

A 1988 WWD news release argued that: "Economists have a 'rule of thumb' measurement that says that crops grown in a region generally have an economic impact three times greater than their basic value. Each dollar produced on the farm is said to circulate through local economies three times. Using this yardstick, the total economic impact of agriculture in WWD in 1986 amounted to $1,696,643,000." But as a grape-grower nearby commented, "none of the profits trickle-down to the local economy because they are passing through sticky fingers." The WWD admission that such a large sum of money is involved only illustrates more starkly the human costs of the concentration of resources.

ADDITIONAL LOW-COST WATER FOR POORLY DRAINED LAND



Critics calling for implementation of the RRA acreage limitations point out that when the Bureau provides inexpensive irrigation water the result can be abusive and wasteful irrigation practices. According to Hal Candee, attorney for the Natural Resources Defense Council, "Since agriculture uses 85% of California's water, conservation in the agricultural sector could make a significant amount of water available to improve stream flows, and Delta outflows. If large farms paid more for their water, they would have an incentive to conserve it."

A large portion of the San Joaquin Valley suffers from various types of drainage problems such as perched water tables and salt buildup in the soil. In 1983, biologists discovered that birds in the Kesterson Wildlife Refuge had suffered nesting failures and deformities because of toxic levels of the element selenium. It turned out that the selenium had been leached from soil during irrigation and deposited in the wildlife refuge by drainage pipes from farms to the south.

Reclamation policy has been twisted in a peculiar manner to encourage larger farms to irrigate areas with drainage problems. The law has been interpreted in a way that makes extra subsidized water available to large farms. This came about because of a provision in the law that allows farms on land of poorer productive capacity to receive subsidized water on more than 960 acres. The Bureau interpreted "poorer productive capacity" to mean nothing more than "poorly drained." In the WWD, the Bureau deemed that 65% of the land was subject to these increased entitlements. **Farms on the poorly drained land can now receive subsidized water to irrigate 1,123-1,257 acres rather than 960 acres.**

Some urban environmentalists have charged that agriculture in California is responsible for many of the state's environmental problems. They cite pesticides in groundwater, agricultural drainage water full of pollutants, excessive water use, and damage to waterfowl, fish and other wildlife.

On the other hand, there are many farmers who use safe agricultural techniques and who are very concerned about the sustainability of the land where they live and farm. Alan Garcia, an organic rice grower in the northern Sacramento Valley points proudly at the safe wetlands that his management techniques have created. In his fields one can see swans, Canada geese, mallards, and pintails. After his rice is harvested, the fields are reflooded for habitat, using as much natural runoff as possible. Although it is normal practice to burn rice straw after harvest, this creates air quality problems. Instead, Garcia encourages the birds of the Pacific flyway to glean leftover rice seed. In turn, during their searching they fertilize his fields and help to break down the straw. Clearly there are some sectors within agriculture that have taken care in the stewardship of their resources.

WHO SHOULD GET THE WATER?

Allocation of water resources has always been a contentious issue in California. The creation of reservoirs and the diversion of streams and rivers have had far-reaching effects beyond agriculture. Northern California fisheries, wildlife populations, the San Francisco Bay Delta, and California's wild and scenic rivers have all been irrevocably changed, and for the worse according to many critics.

Severely reduced instream flows resulting from Bureau of Reclamation impoundments and diversions have drastically reduced fish populations in some of California's formerly most productive river systems. The Trinity River in Trinity and Humboldt Counties is one such case. Since 1964, when it began operating as the first unit of the Central Valley Project, the BOR's Trinity River Division has impounded over 1.0 million acre feet of Trinity water every year for export to Santa Clara, Sacramento, and San Joaquin Counties. A 1980 Interior Department Environmental Impact Statement concluded that the primary cause of decimated salmon runs (80-90% losses in some runs) was the 90% reduction in the Trinity's annual flow.

The Hoopa Valley Indian Reservation, California's largest reservation, sits athwart the lower 14 miles of the Trinity River. The Hoopa Valley Tribe has lived along the Trinity and fished its salmon runs for at least 10,000

years. The Hoopas' federally protected fishing rights include reserved rights to Trinity instream flows adequate to maintain a natural fishery restored to pre-dam abundance.

Fishing in the aboriginal manner, with near-exclusive authority to regulate themselves continues to be one of the primary cultural subsistence activities of the Hoopa Valley Tribe. Salmon are used for basic family subsistence and as a central feature of the elaborate tribal ceremonies still practiced at ancestral sites along the banks of the Trinity. According to Steve Suagee, an attorney for the Hoopa Valley Tribe, "Of all the Tribes in California, the Hoopas are unique in never having ceased the practice of traditional ceremonies. Salmon are indispensable to the continuing vitality of all ceremonies, two of the most important of which last for ten days. The opportunity to fish is the opportunity to pursue one's identity and cultural status as a Hoopa tribal member."

When the Trinity River Division was authorized by Congress in 1955, the legislation mandated that BOR would protect North Coast fishing interests by preserving natural fish populations in the Trinity River. After it became apparent that severely reduced instream flows had decimated the salmon fishery, the Interior Department in 1981 established the current fishery release schedule for the Trinity River Division that would promote the restoration mandated both by Congress and by the federal duty to protect tribal rights. However, fishery releases are lowered drastically in dry and critically dry years. In addition, the BOR frequently ignores inflow forecasts for Shasta and reduces Trinity flows to near dry year levels in violation of the 1981 fishery release schedule. At the same time the BOR makes full irrigation deliveries to its agricultural customers in the south.

Because the 1981 fishery release schedule was intended in part to fulfill federal duties to protect tribal rights, the Hoopa Valley Tribe logically argues that flow reductions in violation of the schedule violate their rights. "The basic problem," says attorney Stave Suagee, "is the way Interior has made instream flows take a lower priority to trans-basin irrigation deliveries or power generation."

"If the BOR would simply eliminate the dry year reductions in Trinity instream releases, which are both illegal and harmful to the fish, they might be able to achieve a real victory for fish habitat restoration," said Suagee. "That would be a great benefit not just to the Hoopa Valley Tribe, but to offshore fishing interests, tourism, and the depressed North Coast economy in general. Since the BOR claims to have over one

million acre feet in uncommitted yield available for sale, there is no excuse whatsoever not to protect full Trinity flows."

CLOSE THE LOOPHOLES!

Federal reclamation policy has been criticized by farmers who maintain that it has been manipulated to the advantage of large industrialized agriculture. Other rural residents believe that as farm structure becomes more and more concentrated, the quality of life in rural communities suffers. Environmentalists assert that if acreage limitations in the law were enforced, farmers would be more conserving of their water resources.

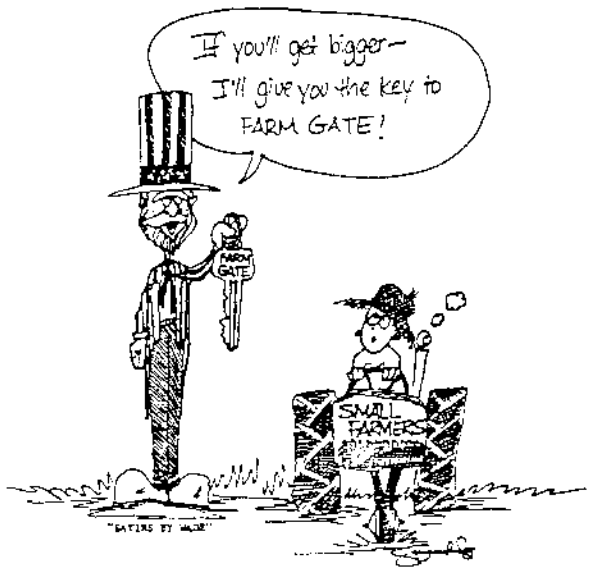
In the spring of 1988, organizations representing these viewpoints on reclamation policy joined forces in a legal challenge to the rules that have been used by large farms to get subsidized irrigation water. California Action Network, California Association of Family Farmers, League of Rural Voters, Natural Resources Defense Council (NRDC), Trinity County Board of Supervisors, and the National Wildlife Federation are being represented in Sacramento federal court by lawyers from NRDC and California Rural

Legal Assistance.

The plaintiffs assert in their complaint that the rules violate the intent of Congress to set a firm limit of 960 acres on the size of a farm eligible for federal irrigation subsidies. "Instead, the rules both allow and encourage large-scale operations to simply restructure on paper into a maze of trusts and 'paper farms' to get around the subsidy limitation," according to a NRDC news release.

The lawsuit also challenges the apparent conflict of interest of one of the Interior Department's attorneys who was involved in job discussions with a law firm representing large growers while making recommendations on changes in the rules. A cozy relationship between large growers and Bureau policymakers has been suspected for a long time, and the plaintiffs in this lawsuit argue that this recent example violated what should have been an impartial rulemaking process.

The lawsuit was originally brought against officials in the Department of Interior and the Bureau of Reclamation. However, virtually every major water contracting association in California representing agricultural water interests has subsequently intervened, as has the National Water Resources Association (NWRA), a well-funded lobbying group that allies its interests with industrialized agriculture. NWRA has inititated a nationwide fundraising effort in order to support their viewpoint in this lawsuit.



RECOMMENDATIONS FOR CHANGE

Several substantive changes in policy are needed to improve conditions in the Central Valley of California:

1. **Farm operations greater than 960 acres should pay the full cost for their water.**

2. **Absentee farmers, and large land management companies should pay the full cost for their water.** Reclamation law formerly required that subsidized water only be made available to farmers living on or near their farms. This requirement was abandoned in 1982. It should be reinstated.

3. **An investigation of enforcement failures of reclamation law must be initiated.**

4. **Irrigation of poorly drained land should not be encouraged** by providing farms on such land with extra quantities of subsidized irrigation water. The poorest land should be retired from agricultural production.

5. **New family farms should be fostered in the Central Valley** by providing capital at generous terms and ample assistance to qualified applicants.

6. **The creation and enforcement of water policy in California must be isolated from those with a vested financial interest.** Disenfranchised poor people living in the Valley must be registered to vote and organized to protect their interests.

7. **Agricultural policy should be actively encouraging farms with a good record** in:
   * soil and water management
   * agricultural waste management
   * reduced uses of chemical fertilizers and toxic pesticides; and
   * equitable farm labor working conditions.

Such farms should be the ONLY beneficiaries of any state or federal agricultural program payments.