University of Arkansas
NatAgLaw@uark.edu | (479) 575-7646

An Agricultural Law Research Article

The New Federalism: Time for States to Pull the Plow in Soil Conservation

by

Kenneth E. Barker

Originally published in SOUTH DAKOTA LAW REVIEW
30 S. D. L. REV. 546 (1986)

THE NEW FEDERALISM: TIME FOR STATES TO PULL THE PLOW IN SOIL CONSERVATION

"A nation's wealth may be measured by the depth of its top soil."—Thomas Jefferson.

A South Dakota rancher was recently cited for his long-standing commitment to the conservation of range land. The ranch had been in the family since his parents homesteaded in the late 1800's. When asked why his dedication to the preservation of the land was unwavering, even in years of adverse conditions, he was philosophical in his response: "I've never really owned this land—I'm only borrowing it from my children."

INTRODUCTION

Soil management issues[1] are among the most critical questions facing American agriculture. The effect of failed federal soil conservation programs, inconsistent national agriculture policies and a renewed emphasis on states' self-determination have left soil management in the doldrums.[2] Despite decades of public works projects costing billions of tax dollars, soil erosion remains a serious problem.[3] Notwithstanding the application of numerous bureaucratic "band-aids" in an attempt to salvage what remains of Congress' original intent to manage soil erosion, the shortcomings in existing federal programs are still readily admitted.[4] To add to the problem, federal budgets are being dramatically reduced in order to encourage states to accept land

1. In the context of this Comment, "Soil Management" focuses upon effective stewardship of the soil, although it has a close relationship to the preservation of agricultural lands from indiscriminate conversion to non-agricultural uses. Heavily eroded, depleted and arid land become ripe for urban development. Fortunately, South Dakota is in need of industrial development to support its agriculture base and therefore urban sprall is not, as yet, a social-economic factor with which we must deal. Nevertheless, states which have supported balanced urban and industrial growth, along with substantial agricultural dependence, are finding that prime farm lands are disappearing, only to be replaced by large developments and pavement. These states are now experiencing the environmental and economic cost of this urban expansion. *See, e.g.*, Comment, *Beyond the Williamson Act: Alternatives for More Effective Preservation of Agricultural Land in California*, 15 PAC. L.J. 1151 (1984).

It is estimated the United States loses 3 million acres of farm land annually to development. Banks, *The Politics of Farm Land Preservation*, 9 FLA. ENVTL. AND URB. ISSUES, 10 (1982). The important consideration in urbanization of farm land is that once speculators take over farm land, incentives to invest time and money on conservation practices diminish significantly. *See, e.g.*, Comment, *Differential Assessment for Agricultural Land Creates a Tax Haven for Speculators*, 34 U. FLA. L. REV. 848 (1982).

2. The effectiveness of the major soil conservation programs in meeting soil productivity goals had not been assessed until 1977. In that year, the National Resource Inventory (NRI) discovered that the long-held goals of soil conservation and improving farm income were in conflict. The Comptroller General of the United States, in a report to Congress, criticized these programs and censored the Soil Conservation Service (S.C.S.) for its failure, within the Conservation Operations Program, to direct assistance to areas with the most critical erosion problems. *See* Government Accounting Office, 1977, *To Protect Tomorrow's Food Supply—Soil Conservation Needs Priority Attention*. Report to Congress by the Comptroller General of the U.S. CED 77-3C, Washington D.C.

3. *See Infra* note 6.

4. Cook, *Problems and Prospects for the Agricultural Conservation Program*, 36(1) J. SOIL & WATER CONSERVATION 24-27(1981).

management responsibilities within their borders.[5]

Meanwhile, wind and water erosion inflict twenty-five to thirty-five percent more damage than during the Dust Bowl days of fifty years ago.[6] The problem is compounded by the need for economies of scale which force producers to plow fence-row to fence-row to meet ever-increasing fixed costs. As a result, long-term conservation planning is lost in the overwhelming need for short-term cash flow. Even in South Dakota, a state generally considered progressive in its erosion control efforts,[7] farmers plow more and more marginally productive land—up to 23,000 acres annually—that consequently wastes away at the alarming rate of up to nineteen tons per acre every year (T/A/Y).[8] Unfortunately, since erosion is mostly a gradual process, the short-run costs are usually undiscernible, especially when compared to the infinite cost to society when the land's productive capabilities are lost forever.

Together, these factors suggest that the federal agencies responsible for directing the nation's soil conservation programs need significant revamping. Such a simplistic answer, however, does not do justice to a few of the substantial accomplishments of soil conservation programs; nor would it, without more, provide a responsible direction for a method designed to improve the existing system.[9] Nevertheless the states, especially those heavily dependent on agriculture, are finding it necessary to respond immediately to the soil erosion problem. Some are building upon existing federal programs, while others are acting on their own to adopt innovative strategies designed to curb the

5. Kendall, *Soil Conservation Service in Danger of Eroding Away*, Sioux Falls Argus Leader, Feb. 11, 1985, at 2C, col. 1.

6. The Capital Times, Nov. 19, 1981, at 46, col. 1, *citing* Massey & Silver, *Property Tax Incentives Programs Under Constitutional Taxing Limitations*, 39 DEN. L.J. 485, 486 (1981). The USDA, 1981 PROGRAM REPORT AND ENVIRONMENTAL IMPACT STATEMENT, REVISED DRAFT, SOIL AND WATER RESOURCES CONSERVATION ACT at 3-5 [hereinafter cited as R.C.A.].

One acre of cropland topsoil one inch in depth weighs about 150 to 165 tons. *See* 1980 COUNCIL ON ENVIRONMENTAL QUALITY (CEQ) ANN. REPORT, 4, SOIL DEGRADATION: EFFECTS ON AGRICULTURAL PRODUCTIVITY (NACD) (1980).

The cost of soil erosion in terms of dollars is difficult to compute, although most sources put the number at a multibillion dollar figure. This includes loss of productive agriculture soil, loss of water quality, chemicals, herbicides, fungicides and asthetic loss. *See Soil Erosion*, *supra* note 3 for an excellent in-depth analysis of the annual cost of soil erosion in the United States.

7. USDA *Soil Conservation Service, Estimated Land Use Conservations in South Dakota*, July 1, 1982-June 30, 1983, at 2-3. Of the 230,000 acres per year of converted grasslands, about 43,300 acres of *native* grasslands were converted to cropland. Since 1974, cropland in South Dakota increased by 728,500 acres with almost 56% of the new land brought into production too fragile to expect continuous production. *Id.*

The nation's cropland erodes at an average rate of seven tons per acre per year, yet soil is thought to form at a rate of only 0.5 tons per acre per year. Thus, America's agricultural soil is being eroded 10 times faster than it is being formed. *See* Office of Technology Assessment, IMPACTS OF TECHNOLOGY ON U.S. CROPLAND AND RANGELAND PRODUCTIVITY, REP. TO CONG. (1982).

8. Since the 1930's, soil conservation programs have evolved to encompass many goals beyond their original intent to maintain soil productivity and support farm income. These goals now include flood control, water quality improvement, cropland recovery and general environmental protection. For a complete history of the development of the federal soil conservation effort, *see* Williams, *Soil Conservation and Water Pollution Control: The Muddy Record of the United States Department of Agriculture*, 7 B.C. ENVTL. AFFAIRS L. REV. 365 (1975) [hereinafter cited as *The Muddy Record of the United States Department of Agriculture*].

9. Braden and Uchtmann, *Soil Conservation Programs Amidst Faltering Environmental Commitments and the "New Federalism,"* B.C. ENVTL. AFFAIRS L. REV. 639, 649 (1982-83) [hereinafter cited as *Soil Conservation Programs Amidst Faltering Environmental Commitments*].

steady flow of soil down the streams. If more farmbelt states do not enact similar measures now, they may be forced to do so in haste later, with the likely result being an inefficient method of "undemocratic arrangements molded by the exigencies of the moment."[10]

This comment outlines a method by which states should approach soil conservation planning. It surveys the major federal soil conservation programs and notes the gaps and inconsistencies in federal conservation policies. In arriving at a solution, this comment acknowledges that a small number of states, South Dakota among them, are responding to the erosion crisis in a progressive manner. These few states recognize that effective conservation planning lies with the state and local government cooperating in comprehensive soil management planning. Soil conservation has been found by these states to be intimately tied to local geographic and resource conditions. While federal involvement is needed for financial assistance, surveys and technical assistance, it is the states that must be ultimately responsible for planning, implementing and enforcing conservation measures. Finally, this article suggests that states adopt a comprehensive conservation plan that includes a balance of incentives and mandatory enforcement mechanisms to implement their plans.

STRATEGY

The lack of overall effectiveness in soil preservation programs over the last half century suggests that an alternative approach is needed. Both the state and federal governments must develop a long-range plan for soil conservation. The basis for future erosion control programs should emerge from a thorough and honest evaluation of past federal and state efforts. Historical inadequacies will not be solved by a mere budgeting placebo, despite what those within the agencies believe.[11] Inherent deficiencies in the approach and the programs espoused by the federal government are the source of failed efforts. Merely increasing funding ignores the problem. These innate problems have evolved to a point that they may slant public perception, and thereby support, for conservation measures. Moreover, they may prevent implementation of effective preservation measures. Just as the agricultural community tends not to implement erosion control measures without expected economic return, so too does public support diminish as perceived economic efficiency decreases.

Public Awareness

Notwithstanding the lack of effective government control over conservation policies, the most fundamental barrier to managing soil wasting continues

10. Arts and Church, *Soil Erosion—The Next Crisis?*, 1982 WIS. L. REV. 535, 539 [hereinafter cited as *Erosion—The Next Crisis?*].

11. Willette, *Budget Cuts Cloud Conservation Service's 50th Birthday*, Sioux Falls Argus Leader, Apr. 27, 1985, at 1C, col. 1.

to be a lack of public perception of the problem. A resurgence of public outcry to address the problem is occasionally noted. Close scrutiny reveals, however, that the source of this supposed wide-spread public sentiment is usually environmental groups and the self-perpetuating interests of the United States Department of Agriculture (USDA).[12] As one economist put it, "[t]he [USDA] seeks to accommodate the conflicting political pressure [of the environmental and agricultural groups] it faces and endeavors to put the best possible interpretation on its soil conservation performance."[13] The misinformation is potentially more dangerous than ignorance itself. As a result of the nation failing to make an honest evaluation of soil conservation programs, the general public remains ignorant of the significance to the future of wind and water erosion.

Perhaps the lack of general public sensitivity to the issue is due to the divergence of urban and rural interests. The argument is largely economic as to both groups, but with a different basis. First, urban populations and the environmental concerns they support usually center around the protection or preservation of landscapes, often in pristine condition. In keeping with their roots in the environmental movement of the 1960's and 1970's, productivity, at least in the economic sense, is seldom a factor in environmental issues. Rather, until the issue becomes economic or aesthetic, the general public, discounting environmental groups, will not involve itself in soil conservation. Based upon that presumption, erosion becomes economic only when it affects supply and hence prices at the market. By the time erosion affects supply at the market, irreversible damage has already occurred and even then the incremental increase in food prices is largely disproportionate to the long-term loss of irreplaceable top soil. Thus, the general public is seldom aware of the subtle, everyday costs of soil erosion.

Likewise, erosion affects aesthetic value and thereby public sentiment only after tons of soil and the fertilizer and pesticides traveling with it have moved into a waterway—again too late to prevent the harm already done. As Secretary of Agriculture John R. Block sees the conservation dilemma: "Americans are . . . people of surplus. We consider it our heritage and our right. We see no limits, recognize no boundaries. Yet in taking bounty for granted in our lifetime, we may deny our children."[14] Thus, there is little likelihood of any outcry from urban America for effective conservation programs.

In a similar manner, agriculture interests are driven by the same economic principles that move urban populations, but in a slightly different direction. Protecting agricultural land is, of course, done by farmers and ranchers.

12. ROEDER, A DISCUSSION, SOIL CONSERVATION POLICIES INSTITUTIONS AND INCENTIVES 19 (1982).

13. TO PROTECT TOMORROW'S FOOD, SOIL CONSERVATION NEEDS PRIORITY ATTENTION, REPORT TO THE CONGRESS BY THE COMPTROLLER GENERAL OF THE UNITED STATES, at 16, Feb. 14, 1977 [hereinafter cited as 1977 GAO REP.].

14. SAMPSON, FARMLAND OR WASTELAND—A TIME TO CHOOSE 37 (1981) [hereinafter cited as FARMLAND OR WASTELAND].

But the scope and breadth of that protection is governed by the economic efficiency that will allow them to implement conservation procedures. Macro-economic pressures, such as grain embargoes, national debt and import-export quotas, shape the farmer-rancher's ability to market their product. When all, or a combination of these elements, act to drive down the market, the farmer and rancher are even more pressed to meet short-run cash flow needs. The problem is usually addressed by overproducing, in the short-run, which in turn drives the market down even further, forcing soil conservation into an even lower priority. In contrast, conservation practices normally pay off economically only in the long-run.[15] The reality of the situation is, however, that in order for the farmer or rancher to survive, short-term cash flow must displace long-term conservation planning. In sum, agriculture must produce more and more in response to external pressures, and hence, conservation becomes of less importance. Once again, when the time comes to count the costs of erosion, the damage has already occurred.

Rural insensitivity to the soil erosion problem is even more devastating than that of urban America. In terms of affecting any cohesive government commitment to a well planned conservation program, we must address this question: If the agriculture community has become insensitive to the needs of their land, how can we criticize the general public for being even less so? The fundamental issue, however, is really who will bear the costs of protecting agriculture land and how will they pay? While farmers and ranchers will actually implement conservation measures, the costs, in large measure, must be born by non-agriculture "either in the cost of their food products, in government incentive programs, or in some combination of both."[16] The conclusion may be self-evident that the ultimate success of any soil conservation program will depend upon the inclusion of public *support*, not *pressure*, to stop the wasting of agriculture land.[17] Before any call to initiate long-term public commitment to soil conservation is made, though, it must be preceeded by a thorough and honest evaluation of past conservation attempts by someone other than the agencies themselves.

Evaluation of Past Programs

It took a considerably long time before federal agencies responsible for soil conservation evaluated their own track record. In 1977, the USDA was finally directed to do a comprehensive inventory of existing programs. In that year, Congress passed the Soil and Water Resource Conservation Act (RCA).[18] The Act requires the USDA to: (1) appraise, on a continuing basis, the soil, water, and related resources of the nation's non-federal land; (2) develop a program for furthering the conservation, protection, and enhancement

15. *Erosion—The Next Crisis? supra* note 10, at 539.
16. FARMLAND OR WASTELAND *supra* note 14, at 39.
17. *Id.*
18. Pub. L. No. 95-192, 91 Stat. 1407 (1977), 16 U.S.C. §§ 2001-9 (Supp. IV 1980). *See also supra* note 2.

of these resources; and (3) evaluate conservation achievements annually.[19] Although the statute requires annual evaluations, the USDA need only report every five years.[20] Congress hoped that new data and analysis would result in better information on which to base decisions, and ultimately provide a streamlining of existing programs. Given recent trends in budgeting, however, the need for RCA may be gone.[21] The Reagan Administration's plan to convert federal funds for soil conservation into the form of block grants to states may accomplish immediately what RCA was intended to do after years of study—a transfer of soil conservation responsibility to the states.[22]

The impetus of the RCA was primarily the lack of consistent planning at the federal level. It was not until 1977 that the National Resource Inventory (NRI) documented the failure of federal soil conservation efforts.[23] "Many of the conservation plans . . . were outdated, forgotten by the farmer or just not carried out or used as a basis for making a decision."[24] The report went on to say that the original intentions of the programs were not implemented. Instead, funds were used to build fences, livestock water facilities and irrigation systems. Furthermore, funds expended for "permanent" vegetative cover had been converted back to crops as soon as the farmer's contract expired.[25] The report concluded that "[f]ederal financial assistance is not directed toward critically needed soil conservation practices having the highest payoff of reducing erosion."[26]

Although the states' record in soil conservation is nearly as discouraging as that of the federal government, the states have two distinct advantages. First, states are more intimate with the wide range of possible solutions to varied erosion problems. For example, state agencies have first-hand knowledge of detrimental weather conditions, such as drought, that demand immediate attention to circumvent corresponding wind erosion. State and local governments are more aware of local attitudes, agricultural practices, economies and geographic conditions—all of which may, in varying degrees, affect the performance of soil conservation programs. This intimacy gives the states a distinct edge over past federal conservation programs, which have failed to take note of fundamental legal, technical and social elements of a purely local nature that intertwine soil management. Second, the states may build from the federal government's knowledge earned through experience and error. A

19. 16 U.S.C. § 2003(c) (Supp. IV 1980).

20. 16 U.S.C. § 2003(a) (Supp. IV 1980). The next report is due to Congress in the 1985 session.

21. LEMAN, *Political Dilemmas in Evaluating and Budgeting Soil Conservation Programs: The RCA Process*, in SOIL CONSERVATION POLICIES INSTITUTIONS AND INCENTIVES, 48 (1982) [hereinafter cited as *Political Dilemmas in Evaluating and Budgeting Soil Conservation*].

22. In The Agriculture and Food Act of 1981, the Reagan Administration proposed, and Congress authorized, matching block grants to states. Pub. L. No. 97-98 §§ 1514-19, 95 Stat. 1333-35 (1981).

23. K. MEYER, D. PEDERSEN, N. THORSON & J. DAVIDSON, AGRICULTURAL LAW: CASES AND MATERIALS 776-779 (1985).

24. GAO REP., *supra* note 13, at ii.

25. *Id.* at 21.

26. *Id.* at 10-11.

review of federal conservation programs unveils inherent problems that in turn suggest alternative approaches to soil preservation.

FEDERAL SOIL CONSERVATION PROGRAMS

Most federal soil conservation programs have evolved through a complex set of agencies born during the Dust Bowl of the 1930's.[27] Largely due to the ineffectiveness of the original programs, several new programs have since been created. "Programs or agencies have rarely been eliminated when demonstrated to be ineffective or when new soil conservation problems have been recognized; instead new agencies or programs have been created and the old ones retained."[28] Virtually all of the agencies committed to soil conservation, whether old or new, are under the umbrella of the United States Department of Agriculture.

The Resource Conservation Act—A Flawed Approach?

Generally, the Resource Conservation Act was intended to re-align the direction of many resource-management agencies. In theory, it was intended to force the Department of Agriculture and its agencies to take a close look at their inner-structure and find more efficient means to accomplish their goals. There is a danger, however, that too much reliance will be placed on RCA to shape future programs.

The problem with self-evaluation of the USDA, however, is that the entire process is institutionalized and closely contained within the agency. The RCA draft report lists twenty-five separate programs for which evaluations are to be completed by eight different USDA divisions.[29] The evaluations are reviewed by representatives of affected USDA divisions and the USDA Office of Budget and Program Analysis.[30] Thus, each agency controls its own evaluation. There are no provisions for outside input. This is particularly troublesome in this instance because the USDA controls practically all segments of agricultural regulation. Nevertheless, if done properly, even internal evaluation can permit improved management and perhaps, eventually, increase public scrutiny.

The RCA's goals, however, may be even more problematic than the means used to achieve these goals. Theoretically, the RCA is an effort to link economic thinking into agency planning and decision making.[31] Like many

27. National awareness of the impact of soil erosion increased during the late 1920's through the efforts of Hugh Bennett, who is generally regarded as the originator of many conservation methods still in use today. D.H. SIMMS, THE SOIL CONSERVATION SERVICE 6-10 (1970).

28. *Erosion—The Next Crisis?*, *supra* note 10, at 583. Arts and Church cite as the manifestation of this problem the United States Department of Agriculture's proposal to create new local, state and national boards to coordinate the programs of the existing agencies. *Id.* at n.198. *See* GAO REP., *supra* note 13.

29. *Soil Conservation Programs Amidst Faltering Environmental Commitments*, *supra* note 9, at 693.

30. *Id.*

31. *Political Dilemmas in Evaluating and Budgeting Soil Conservation Programs*, *supra* note 21, at 48.

evaluations of social programs, however, RCA allots too many resources for the collection and manipulation of data, with too little time spent on analysis.[32] Proliferation of data alone will not insure a correction in wayward policy. As of yet, the crucial link between program evaluation and planning has not been made.

Generally, RCA fails to do an economic assessment of each of the agency's underlying policies and then plan accordingly. Some economists believed that the mating of evaluation and planning by the USDA tended to neuter both. Even though economics was more widely used in the RCA process, the USDA failed to go to the basis of the problem. The agencies tended to domesticate it as a consequence.[33] Of course, evaluation of soil conservation *policies* rather than accomplishments, on the basis of an economic assessment "[i]mplies that conservation is no longer accepted as an article of faith, intrinsically good on its own merit. Instead, it is regarded as a *means* to achieve other public goals, and it must be justified on that basis."[34] The lack of simple economic analysis by the conservation agencies in carrying out their programs, however, has led to failure to target areas with the most critical erosion-causing waste and duplication, resulting in overall ineffectiveness of conservation efforts.

Economic analysis would greatly assist the agencies in building an effective and efficient conservation plan:

> Closely linked to including economics in the conservation ethic and making it more effective in the budget and program policy arena is to build the capability to use economics as a tool in program administration . . . . The benefit-cost test provides one means of legitimately saying "no" to otherwise deserving citizens . . . . Economist's strongest suit should be the estimation of net incentive. At least they should be able to show which practices are profitable.[35]

Although the nation spends billions on soil conservation, the agencies fail to target spending through an economic assessment. Instead, they provide technical assistance on the basis of political jurisdictions rather than critical erosion control needs to which they supposedly respond. For example, during one Soil Conservation Service (SCS) review, three assistant secretaries responsible for rural development, each from a separate subagency, were told in an economic evaluation that they had filed to ease the level of unemployment and low income in counties with the project any faster than in counties not included. When asked whether they would be willing to use their political influence with their respective agencies to attempt to target USDA resources on a

32. *Id.* at 49-50.

33. ALLEE, *Implementation of RCA: A Problem Accommodating Economics in Soil and Water Conservation*, SOIL CONSERVATION POLICIES INSTITUTIONS AND INCENTIVES 106 (1982) [hereinafter cited as *Implementation of RCA*].

34. STROHKEHN, *A Discussion: Implementation of RCA: A Problem Accommodating Economics in Soil and Water Conservation*, SOIL CONSERVATION POLICIES INSTITUTIONS AND INCENTIVES 110 (1982).

35. IMPLEMENTATION OF RCA, *supra* note 33, at 106.

common area, the answer was a resounding "no."[36] Even an internal SCS evaluation concluded that without increasing the amount spent on the program, the erosion tonnage reduced by it could be appreciably increased by a better distribution of funds among states and could be more dramatically increased by a change in the combination of practices funded on each farm and ranch.[37]

Reality suggests, however, that "targeting" will never be performed on an economic basis, but rather on a political basis unless benefit-cost planning is mandated. Allocations will continue to follow the path of least resistance—congressional district boundaries. Much of the history of conservation agencies is linked to a search for a constituency comparable to that of their respective rival agencies.[38] The skill of the agencies in finding their political base is a tribute to their ability to spread their programs as widely as possible, hence a broad base of political support. Technical service and spending decisions are made on the basis of those who contact the agency, rather than the agency actively seeking out farms and ranches with the most severe erosion problems.[39] The irony is that the maldistribution of conservation efforts that frustrates achievement of desired objectives is also responsible for the agency's political survival.

United States Department of Agriculture

The USDA began soil conservation efforts at the federal level as early as 1894 with the creation of the Bureau of Chemistry and Soils.[40] Continuing from the late 1920's up to the present, the USDA added numerous agencies and programs for soil erosion control and watershed management. Today, as many as thirty-four USDA programs involve soil conservation.[41]

The soil conservation task is performed primarily by two federal agencies, however, under the authority of two principal programs. They are the Soil Erosion Act,[42] implemented by the Conservation Operations Program,[43] and

36. *Id.* at 104.

37. *See* EASTER AND COTNER, *Evaluation of Current Soil Conservation Strategies*, SOIL CONSERVATION POLICIES INSTITUTIONS AND INCENTIVES 290-92 (1982).

38. *Political Dilemmas in Evaluating and Budgeting Soil Conservation Programs*, *supra* note 21, at 53.

39. 1977 GAO REP., *supra* note 13, at 10-11.

40. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 396. In 1908, the Bureau of Chemistry and Soils created a separate division concerned exclusively with soil erosion. In 1914, the USDA created the Extension Division, which also participated in soil conservation activities, among other duties. Almost from the beginning, funding for erosion control research and programs was divided among several USDA agencies. After a 1928 congressional hearing, the USDA was granted funds for research into the causes and prevention of soil erosion. The USDA immediately divided the money among the Bureau of Chemistry and Soils, the Forest Service and the Bureau of Agricultural Engineering. Differences in approaches to the erosion problem created ongoing problems and competition between the agencies. *Id.* at 370.

41. *Soil Conservation Programs Amidst Faltering Environmental Commitments*, *supra* note 9, at 640 n.1.

42. Pub. L. No. 74-46, 49 Stat. 163 (1935) (current version at 16 U.S.C. § 590(a)-(f) (Supp. IV 1980). This Act authorizes the Secretary of Agriculture to control erosion in a variety of ways, including engineering operations, new methods of cultivation, revegetation and changes in land use.

43. 7 C.F.R. §§ 610.1-.5 (1982).

the Soil Conservation and Domestic Allotment Act,[44] administered through the Agriculture Conservation Program.[45] The programs are administered by the Soil Conservation Service (SCS) and the Agriculture Stabilization and Conservation Service (ASCS) respectively. A third agency, the Cooperative Extension Service,[46] may be considered by some as an integral part of the federal program, although its role is primarily dissemination of information and not implementation of policy.

The Soil Conservation Service

The passage of the Soil Erosion Act of 1935 created the first of the principal agencies responsible for soil preservation.[47] As a part of the USDA, the SCS is the frontline agency charged with controlling soil erosion. The Act gave the Secretary of Agriculture broad power to carry out a wide range of conservation measures. The Secretary was authorized to conduct surveys,[48] make investigations,[49] furnish aid and enter into agreements in order to further the purposes of the Act.[50] Although it was an interpretation seemingly lost in the bureaucratic machinery, the Act also mandated coordination among all the federal agencies responsible for soil erosion control.[51]

Significantly, the Soil Erosion Act recognized the need to involve state and local government in planning and implementing effective soil management programs.[52] Hence, the Act requires that assistance provided to the states pursuant to the Act be conditioned upon those levels of government enacting appropriate laws to ensure suitable permanent restrictions on land use and otherwise provide for the prevention of soil erosion.[53] The Secretary may also

44. Pub. L. No. 74-461, 49 Stat. 1148 (1936)(current version at 16 U.S.C. § 590(g)-(h)(7-9)(1976 & Supp. IV 1980)). The Act's original goals were: (1) preservation and improvement of soil fertility; (2) promotion of economic use and conservation of land; (3) dimunition of exploitation and wasteful and unscientific use of national soil resources; (4) protection of rivers and harbors against the results of soil erosion in aid of maintaining navigability and in aid of food control; and (5) re-establishing a parity between per capita incomes on farms and elsewhere in the economy as it existed between 1909 and 1914. 16 U.S.C. § 5909(a) (1976). In 1972, Congress added prevention and abatement of agricultural-related pollution as a sixth goal. 16 U.S.C. § 5909(a)(6)(1976). In the preceeding year, the ACP was given a major overhaul in which it was renamed the Rural Environmental Assistance Program. Pub. L. No. 92-73, 85 Stat. 196 (1971). The original name was restored in 1974. Pub. L. No. 93-563, 88 Stat. 1838 (1974).

45. 7 C.F.R. § 701.3-.26 (1982).

46. The Cooperative Extension Service was created by the Smith-Lever Act, Pub. L. No. 95-79, 38 Stat. 372 (1914) (current version at 7 U.S.C. §§ 341-348 (1914).

47. *See supra* note 42.

48. 16 U.S.C. § 590a(1) (1976).

49. *Id.*

50. *Id.* at § 590a(4).

51. *Id.* at § 590a(3).

52. 16 U.S.C. § 590c (1976) provides:
As a condition to the extending of any benefits under this chapter to any lands not owned or controlled by the United States or any of its agencies, the Secretary of Agriculture may, insofar as he may deem necessary for the purposes of this chapter, require-(1) the enactment and reasonable safeguards for the enforcement of state and local laws imposing suitable permanent restrictions on the use of such lands and otherwise providing for the prevention of soil erosion; (2) agreements or convenants as to the permanent use of such lands; and (3) contributions in money, services, materials or otherwise, to any operations conferring such benefits. *Id.*

53. *Id.*

enter into agreements to provide for the federal acquisition of land, if necessary, to fulfill the purposes of the act.[54]

The Conservation Operations Program

The vehicle the Secretary chose to administer the new changes to the SCS was the Conservation Operations Program (COP).[55] Thus, COP is the focal point of SCS's soil conservation efforts. Under the program, the Secretary is authorized, through the SCS, to further the purposes of the Soil Erosion Act.[56] The provisions of the COP are subject to the restrictions outlined in the Soil Erosion Act, such as enforcement of conservation measures through local laws.[57]

Conservation Districts

Shortly after COP was begun, the Soil Conservation Service recognized a need for a more decentralized approach to the soil erosion problem. It was believed that the "successful operation of the COP would require some kind of local organization" that would understand local needs, develop plans accordingly and provide support for conservation programs that would respond to the local economic and political environment.[58] The soil conservation districts were created upon this premise.

As independent units of local government, with boundaries which generally conform to county lines, soil conservation districts are probably the basis upon which the public judges government's effectiveness in managing soil erosion.[59] The districts were created under the guidelines published by the USDA through a Model Act.[60] The Model Act delegated to the district governing board the authority to: (1) supervise, research and demonstrate projects and erosion control operations; (2) enact and enforce land use regulations; (3) enter into contracts and agreements with land occupiers to carry out conservation plans; and (4) obtain lands in order to carry out control operations or retire submarginal lands from production.[61]

The district governing board was to consist of five supervisors whom were to be elected and two of whom were to be appointed by a state conservation commission.[62] The state conservation commission, in turn, would be comprised of three to five members, including the director of extension services,

54. 16 U.S.C. § 590a(4) (1976).
55. *See supra* note 45.
56. 16 U.S.C. § 590c (1976).
57. *Id.* at § 590c(1).
58. *Soil Conservation Programs Amidst Faltering Environmental Commitments*, *supra* note 9, at 641 n.6 (citing D. SIMMS, THE SOIL CONSERVATION SERVICE 74 (1970)).
59. In 1936, the USDA released a Model Standard State Soil Conservation District Law. SOIL CONSERVATION SERVICE, U.S. DEPT. OF AGRIC., A STANDARD STATE SOIL CONSERVATION DISTRICT LAW (1936); *See also* S.D.C.L. ch. 38-7 (1977 & Supp. 1982) [hereinafter cited as STANDARD ACT].
60. *Id.*
61. STANDARD ACT, *supra* note 59, at § 38-7-8.
62. *Id.* at §§ 38-7-5(f)-6.

the director of agriculture experiment stations, the state conservation commissioner and the commissioner of agriculture or state planning board head as well as an additional member to be appointed by the Secretary of Agriculture upon the invitation of the state commission.[63] Funding for the districts was to be generated through local and state appropriations and service fees.[64] Most states have not extended the authority to tax or levy assessments to conservation districts, although they are allowed to borrow money.[65] In order to receive technical assistance from the SCS, a district must enter into a memorandum of understanding with the USDA.[66] Within the memorandum there is included a description of the district's soil erosion problems, long-range objectives in confronting those problems, and its proposed procedure for so doing.[67] The district, in addition, must supplement the memorandum with its own annual district work plans.[68] Once both the memorandum and the plan have been signed, the SCS provides technical assistance through the district.[69]

Generally, states are given great liberty to enact enabling legislation authorizing districts to be created if they conform with the provisions of the federal Model Act. In turn, the conservation districts have become the foundation for most federal and state conservation efforts. Where variations from the Model Act do exist, for instance in South Dakota, it is usually in an effort to mold the program to local needs and in reaction to the inherent inadequacies of the Act. Two major deviations, however, have had a major impact upon the success of the federal government's conservation efforts.

First, most of the enabling statutes provide for district boundaries to conform with county lines rather than drainage basins, an organization favored by SCS.[70] The result has been the creation of nearly three thousand districts in all states but one.[71] This number is substantially more than the SCS planned, and consequently, the costs of administration and bureaucracy have increased significantly.[72] More importantly, in terms of effective soil erosion control, counties sometimes fail to cooperate with one another, despite their location in the same drainage basin. Thus, there is a greater tendency for duplication,

63. *Id.* The Standard Act was later amended to allow more members. South Dakota has nine members on the commission, plus five non-voting members. S.D.C.L. §§ 38-7-4, 6 (Supp. 1982); 38-8-49.1 (Supp. 1984).

64. STANDARD ACT, *supra* note 59, at §§ 38-7-3(1), 38-7-5(c), 38-7-5(e); *See* S.D.C.L. § 38-7-24 (Supp. 1982).

65. STANDARD ACT, *supra* note 59, at § 38-7-8. Thirty-three states do not give districts the power to levy tax assessments. Eighteen states do not allow districts to borrow money. Districts are prevented from issuing bonds in 32 states. *Soil Conservation Programs Amidst Faltering Environmental Commitments*, *supra* note 9, at 643 n.13. South Dakota allows districts to borrow funds and pledge the credit of the district. S.D.C.L. § 38-8-54.1 (Supp. 1984).

66. 7 C.F.R. § 660.3 (1977).

67. *Id.*

68. *Id.*

69. 7 C.F.R. § 610.4 (1982).

70. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 378.

71. *Erosion—The Next Crisis?*, *supra* note 10, at 593.

72. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 378.

overlap, and at times, contradictory programs.[73] South Dakota identified this potential for "turf fighting" early, however, and legislated that districts cooperate with each other and among other political bodies.[74] Whether the intended result is achieved, however, is open to question.

The second major departure from federal guidelines has received mixed reviews. A majority of states either did not authorize, or later deleted from their enabling statutes, a mechanism to enact land use regulations.[75] As a result, districts are unable to focus attention on land with the most severe erosion due to the lack of mandatory use-control regulations. Even in those states with a method by which districts could adopt land use controls, farmers and ranchers remain very reluctant to force land use restrictions, perceiving them as an infringement on individual freedom.

Other Activities Through the Conservation Operations Program

Even though the emphasis of the COP has been to supply technical assistance to farmers and ranchers through conservation districts, the program includes a number of other activities. For example, the program includes a number of other activities. For example, the program conducts all USDA soil survey work,[76] in addition to snow surveys and water supply forecasts for the SCS.[77] Municipal and county boards and planning bodies are provided assistance through the program to help solve land-use and erosion problems.[78] More importantly, in terms of any future successful cooperation between federal and state governments in managing soil erosion, it is SCS responsibility to supervise a national land inventory and monitoring program.[79] Like all COP activities, the SCS is largely prohibited from providing financial assistance to landowners.[80]

73. Williams, in *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, cites this as an example: A typical situation in which districts of ten work at cross-purposes is in the area of erosion and flood control. An upstream district might seek to clear and channelize a stream in an effort to increase flows and reduce flooding and erosion. The effect in downstream districts from the additional water might be increased flooding and bank erosion and perhaps damage to structures the downstream district had constructed to combat its flooding and erosion problems. *Id.* at 378, n.83.

74. S.D.C.L. § 38-8-52 (1977).

75. STANDARD ACT, *supra* note 59, at § 38-7-9. South Dakota adopted enabling legislation in 1937.

76. 7 C.F.R. § 661.1(b) (1977).

77. 7 C.F.R. § 611.20 (1977).

78. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 382.

79. The purpose of the inventory and monitoring is

> [t]o provide soil, water and related resource data for land conservation, use and development, for guidance of community development, for identification of prime agricultural producing areas that should be protected, for use in protecting the quality of the environment, and to issue land inventory reports of resource conditions.

Id. at n.104 (citing *Senate Hearings on Agriculture Appropriation*, FY 1977).

80. Although the S.C.S. has long sought to disburse financial assistance in order to strengthen its relationship with landowners, the agency's only cost sharing functions to date are authorized by the Great Plains Conservation Program and the Small Watershed Program, in which S.C.S. may share the costs of erosion control practices with landowners. 16 U.S.C. § 590(p) (Supp. IV 1980) (Great Plains Conservation Program); 16 U.S.C. §§ 1001-1009 (Supp. IV 1980)(Small Watershed Program).

Other Soil Conservation Service Activities

SCS also provides a variety of other services. At the same time SCS was developing its soil erosion program to accommodate the newly-formed soil conservation districts, its responsibilities in other areas were also expanding. Eventually, SCS developed its activities to include programs devoted to increasing farm-ranch income and productivity through means other than erosion control.[81] The additional charges came primarily in the form of three programs: the Great Plains Conservation Program,[82] Resource Conservation and Development Program,[83] and the Small Watershed Program.[84]

The Great Plains Conservation Program is similar to the COP, but unlike the latter, it allows the SCS to enter into cost-sharing arrangements with land occupiers who agree to adopt new land-use practices or implement approved soil and water conservation measures.[85] It may have been to the detriment of soil management that many public conservation issues ranging from wildlife and recreational development to pollution control have found their way into the program.[86] For purposes of soil erosion, however, the program allows the SCS to enter into three to ten year contracts with land occupiers to pay up to eighty percent of the total cost, to a ceiling of $25,000, for any one conservation measure.[87] The overall objective of the program remains the prevention of serious wind erosion problems during erratic climatic periods such as drought, in designated portions of ten Great Plains states, including South Dakota.[88] The Great Plains Program is generally regarded as one of the few regional programs that have been successful.[89] Its approach has been suggested as a model for all conservation programs now employed at the federal level.[90]

Consistent with the trend toward the expansion of SCS's responsibilities, the Resource Conservation and Development Program emphasizes improve-

81. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 384.

82. 16 U.S.C. § 590(p) (Supp. IV 1980). This program provides technical and financial assistance for wind erosion control measures in 10 great plains states, including South Dakota. Cost-sharing of up to 75% is tied to long-term agreements to maintain conservation measures. The agreements stipulate three to ten year terms. 7 C.F.R. §§ 701.13(c), 701.16(a)(1976).

83. 16 U.S.C. § 590(a) (1976); 7 U.S.C. §§ 1010-1011 (1970). The program was authorized in the Food and Agriculture Act of 1962. Pub. L. No., 87-703, 76 Stat. 605 (1962).

84. 16 U.S.C. §§ 1001-1009 (Supp. IV 1980). Under the Small Watershed Program, the SCS is responsible for flood control in watersheds or sub-watersheds not exceeding 250,000 acres and not containing any one control structure with storage capacity in excess of 5,000 acre feet. The costs of private flood control structures in such cases may be shared by the SCS

85. *See supra*, note 82; 16 U.S.C. § 590(p)(1970).

86. 16 U.S.C. §§ 590(p)(b)(1)(a), & 590 (p)(b)(1)(b), 590(p)(b)(1)(c)(1970).

87. Authorized rates for federal assistance range from 50% to 80% of the total installation costs, with the average assistance amounting to approximately 65% of the total. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 390.

88. 16 U.S.C. § 590(p) (1970). The other nine states are Colorado, Kansas, Montana, Nebraska, New Mexico, North Dakota, Oklahoma, Texas and Wyoming.

89. *Soil Conservation Programs Amidst Faltering Environmental Commitments*, *supra* note 9, at 657.

90. Kendall, *supra* note 5.

ment of the economic position of the farmer and rancher.[91] This objective is accomplished through the cooperative efforts of several federal agencies.[92] Local sponsors, soil conservation districts, for example, prepare master plans with USDA assistance that identify specific conservation measures which may qualify for federal financial and technical assistance.[93] Preservation measures eligible for both financial and technical assistance include the stabilization and treatment of critical erosion areas, flood prevention measures, irrigation and drainage improvements, and land and water management for control of agriculture pollution.[94]

The third system, the Small Watershed Program, recognizes the inherent relationship between flooding and soil erosion.[95] The program supplements Army Corps of Engineer projects by dealing with flood problems on smaller upstream tributaries of principal waterways.[96] As one might expect, the overlapping of authority in this area by two departments has led to typical agency antagonisms and infighting for control in order to maintain respective political bases. Congress' parental response to the squabbles was a liberalization of original program intent to allow expenditure of federal funds for projects ranging from fish and wildlife and recreational development to reimbursement to farmers for the cost of flood control structures.[97] Given the substantial deviation from original goals, it is not surprising that the true worth of the Small Watershed Project with respect to soil conservation remains dubious.

The Agriculture Stabilization and Conservation Service

The Agriculture Stabilization and Conservation Service (ASCS), is the primary agency involved in providing financial assistance to farmers and

91. 16 U.S.C. § 590(a); 7 U.S.C. §§ 1010-1011 (1970). The program was authorized in the Food and Agriculture Act of 1960. Pub. L. No. 87-703, 76 Stat. 605 (1962).

92. These agencies include the Forest Service, the Farmers Home Administration, the Federal Extension Service and the Economic Research Service. 16 U.S.C. § 590(a).

93. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 393.

94. *Id.*

95. Technically known as the Omnibus Flood Control Act of 1936, the program was a joint effort between SCS, the Bureau of Agricultural Economics and the Forest Service to manage soil erosion caused by flooding. Pub. L. No. 74-738, 49 Stat. 1570 (1936).

96. Therefore, the program was termed the "Small Watershed Program." *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 385.

The Watershed Protection and Flood Prevention Act of 1954 granted to the SCS the authority to control jurisdiction over watersheds or subwatersheds not exceeding 250,000 acres and not involving a single structure providing more than 5,000 acre feet of total storage capacity. Pub. L. No. 83-566, 68 Stat. 666 (1954)(current version at 16 U.S.C. §§ 1001-1009 (1976)). The law also permitted SCS to partially reimburse farmers for the cost of flood control construction, although the law has since been liberalized to also allow the expenditure of federal funds for a portion of fish, wildlife and recreational development costs. *Id.* at § 1004(1)(1976).

The 1954 Act and its amendments signify a change in the emphasis of the Flood Control Act of 1936, which was enacted previously as a means of dealing with the problems of soil erosion and mitigating damages from floods. Pub. L. No. 74-738, 49 Stat. 1570 (1936). In addition to traditional responsibilities, such as promoting conservation and flood control, authorized project purposes now include conservation and proper utilization of land, agricultural water management, public fish and wildlife conservation, water quality management, ground water supply and agricultural pollution control. 7 C.F.R. § 622.3(a)(1977). *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 386-87.

97. *Id.*

ranchers through cost-sharing programs.[98] Those programs evolved from the technical assistance already provided by the SCS. Like the SCS, the ASCS is a descendant, although indirectly, of the Dust Bowl Era.[99] The Service, originally known as the Agriculture Adjustment Administration, was intended to increase farm income by raising prices, but not necessarily through soil conservation.[100] The Agriculture Adjustment Act of 1933 directed the Secretary of Agriculture, among other things, to reduce the acreage of basic crops that were in oversupply by applying a system of direct payments to farmers in return for their participation in an acreage control program.[101] The plan was invalidated by the Supreme Court in *United States v. Butler*,[102] but later resurrected in a new form as the Agriculture Conservation Program, which paid farmers to shift acreage from "soil-depleting crops" to "soil-conserving crops."[103] The underlying rationale, however, remained the reduction of certain overabundant crops. Thus, the ASCS backed its way into "soil conservation" through a cosmetic law that allowed indirect price supports.

While the stated purpose of the program was soil conservation, the lack of specific direction understandably caused the agency to shift its emphasis several times during its early history. This was done primarily in the manner in which ASCS grants were awarded to states which carried out approved "conservation" plans.[104] It is significant to note that the grants were originally intended to be "temporary" with the states gradually assuming the role of administration.[105]

---

98. The Soil Conservation and Domestic Allotment Act of 1936, Pub. L. No. 74-46, 49 Stat. 1148 (1935)(codified as amended 16 U.S.C. §§ 590a-590q (Supp. IV 1980)), created the program as presently administered by the ASCS. The program was directed by the Agriculture Adjustment Administration until 1945, and the Production and Marketing Administration administered it until the early 1960's, at which time the ASCS took over administrative responsibilities. *Soil Erosion*, *supra* note 3, at 584 n.206.

99. *Id.*

100. *Id*; The Agriculture Adjustment Administration was created in 1933 by the Agriculture Adjustment Act. Pub. L. No. 73-10, 48 Stat. 31 (1933).

101. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 396.

102. 297 U.S. 1 (1936).

103. Pub. L. No. 74-461, 49 Stat. 1148, 1150 (1936).

104. During the early years of the program, income supplement payments to farmers for converting acres of their land from soil-depleting to soil-conserving crops accounted for the bulk of expenditures under the Act. By 1940, however, the emphasis of the program was shifted to conservation. Total expenditures under the Act averaged over $400 million per year from 1936 to 1943. Payments made strictly for conservation purposes rose from $6 million to over $200 million annually during the same period. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 397-98.

105. Rasmussen, *History of Soil Conservation, Institutions and Incentives*, SOIL CONSERVATION POLICIES INSTITUTIONS AND INCENTIVES, 9 (1982) [hereinafter cited as *History of Soil Conservation, Institutions and Incentives*]. States are divided into local administrative areas no larger than one county in size. Farmers and ranchers within each area who participate in ASCS programs are eligible to participate in electing a three-member local ASC committee each year. The local committee members, in turn, join in an annual county convention to re-elect a county committee composed of three farmers and ranchers residing in that county. County committee members hold three-year, staggered terms. The county extension agent may serve as the secretary of local and county committees, in which case the agent becomes a non-voting member. The state committee is composed of three to five farmers who reside in the specific state and who are appointed by the Secretary of Agriculture. The state extension director is an *ex officio* member of the state committee. *Soil Conservation Amidst Faltering Environmental Commitments*, *supra* note 9, at 647 n.40. *See infra* text of note 114.

The Agriculture Conservation Program

The ASCS did not assume responsibility for the Agriculture Conservation Program (ACP) until the early 1960's, years after its inception.[106] Up to that time, it underwent few major changes. The SCS continued to provide technical assistance for implementing conservation measures, while the emphasis of ACP was cost-sharing assistance, preferrably for permanent measures such as terraces, dams, dugouts and grassed waterways.[107] One popular amendment to the program was the Agriculture Act of 1956, which created the Soil Bank.[108]

The Soil Bank was a large-scale effort to make adjustments between supply and demand for agriculture products by taking land out of production.[109] The program had two segments, an acreage reserve and a conservation reserve. Under the acreage reserve, farmers reduced the acreage of certain crops planted below established allowments, or in the case of corn, their base acreage, and received payments for the diversion of such acreage to conservation uses.[110] The objective of the conservation reserve was the designation of certain cropland for the reserve and applying it to conservation use. Although moderately successful, the Soil Bank was discontinued in 1958.[111] Its ghost however, appeared in the form of the 1984 Payment in Kind (PIK) program, which was designed to reduce grain surplus by taking land out of production.[112] During these days of continued surplus, plans that mirror the Soil Bank program appear frequently.

Finally, in 1971, the ACP was given a new direction that emphasized improved environmental quality, abating agricultural pollution and concentration on the most critical conservation needs.[113] The ASCS continues to administer the program and has offices in every state and most counties. The Agriculture Stabilization and Conservation (ASC) committees direct the program at the state and local level.[114] The county ASC committee develops a

106. *See supra* note 98.

107. *The Muddy Record of the United States Department of Agriculture*, *supra* note 8, at 399-400.

108. *History of Soil Conservation, Institutions and Incentives*, *supra* note 105, at 11.

109. *Id.* The program was divided into two parts: an acreage reserve and a conservation reserve. The objective of the acreage reserve was to reduce the amount of land planted to allotment crops, wheat, cotton, corn, tobacco, peanuts and rice. Under its terms, farmers cut the acreage planted to these crops below established allotments or, in the case of corn, below their base acreage, and then the farmers received payments for the diversion of such acreage to conserving uses. In 1957, there were 21.4 million acres in the acreage reserve. *Id.*

110. *Id.*

111. *Id.*

112. Pub. L. No. 98-369, § 1061, 98 Stat. 494, 1046-47 (1984).

113. The Agriculture Conservation Program was renamed the Rural Environmental Assistance Program (REAP) in 1971. Pub. L. No. 92-73, 85 Stat. 196 (1971). The program was renamed again in 1973 as the Rural Environmental Conservation Program, Pub. L. No. 93-86, 87 Stat. 241 (1973), and changed back to the Agricultural Conservation Program in 1974, Pub. L. No. 93-563, 88 Stat. 1838 (1974).

114. *See supra* note 105. The "program development groups" establish guidelines and policies for certain ASCS programs, including the ACP. 7 C.F.R. §§ 701.10-.11 (1982). The county program development group includes members of the county ASC committee and representatives of the SCS, the Forest Service, the Farmers Home Administration and the state forest agency. 7 C.F.R. § 701.2(a) (1982). The state program development group includes the members of the state ASC

county conservation program to guide the county level ASCS office in disbursing funds.[115] The county program must be in accord with the policies and goals of the state development group and approved by both the state ASC committee and the Secretary of Agriculture.[116] In addition, the program sets priorities for expending funds in a given year.[117]

Other Agriculture Stabilization and Conservation Service Activities

The Agriculture Conservation Program is the most ambitious ASCS activity. The program itself has many wide-ranging concerns. The Forestry Incentives Program, for example, provides cost-sharing for tree planting, timber stand improvement and various other forestry practices.[118] Under the Rural Clean Water Program, similar grants are given to farmers and ranchers to help eliminate agricultural non-point sources of pollution. The Water Bank Program provides federal incentives to protect wildlife wetlands.[119] The Emergency Conservation Program provides assistance after natural disasters.[120] All programs are directed at the county level.[121] Obviously, the objectives of the ACP have expanded far beyond the original congressional intent.

Agriculture Stabilization and Conservation Service Appraisal—An Uncertain Future?

ACP has been the most expensive federal conservation program to date, with total appropriations exceeding $11 billion since 1936.[122] Like the Conservation Operations Program under ASC, the ACP is subject to evaluation under the Resource Conservation Act and therefore the inherent weakness that pervades the evaluation process under the ASC also applies to the ASCS and its Agriculture Conservation Program.[123] Each agency is in control of its own evaluation with no provisions for input outside the USDA.

Despite the shortcomings of the RCA, it nevertheless reveals an otherwise undisclosed future for the ASCS. The Reagan Administration's approach to the RCA process emphasizes conservation efficiency over pollution

committee, the state Director of Extension, the Conservationist of the SCS and representatives of the Forest Service, the Farmers Home Administration, the state forestry agency, the state water quality agency and the state Soil Conservation Committee. 7 C.F.R. § 701.2(f)(1982). The national program development group includes representatives of the ASCS, the SCS, the U.S. Forest Service, the Science and Education Administration (Extension), the Economics, Statistics and Cooperative Service, the Farmers Home Administration, the office of the General Counsel (USDA), the office of Budget Planning and Evaluation (USDA) the EPA and the Office of Management and Budget. 7 C.F.R. § 701.2(c)(1982).

115. 7 C.F.R. § 701.10 (1982).

116. 7 C.F.R. §§ 701.10, .12, .15 (1982).

117. *Id.*

118. The Forestry Incentives Program (FIP) is authorized by the Cooperative Forestry Act of 1978. Pub. L. No. 95-313, 92 Stat. 367 (1978).

119. The Water Bank Program is authorized in Pub. L. No. 91-559, 84 Stat. 1468 (1972)(current version at 16 U.S.C. § 1301(1976)).

120. The Emergency Conservation Program is established by the Agriculture Credit Act of 1978. Pub. L. No. 95-334, 92 Stat. 433 (1978)(current version at 16 U.S.C. §§ 2201-2205 (1978)).

121. 7 C.F.R. pt. 7 (1982).

122. 1977 G.A.O. R.E.P., *supra* note 13, at 3.

123. *See supra* notes 18 thru 22 and accompanying text.

control.[124] The result of such an attitude could eventually lead to a general decline in USDA financial support for non-point pollution control efforts, which are an ASCS mainstay.[125] The decline, however, will most likely follow budget reductions in the services provided by SCS.

Another factor contributing to future insecurity is the mounting public criticism of USDA's lack of coordination between the ASCS and the SCS programs. Since their inception, these agencies have had a relatively tense relationship that at times spills into open warfare.[126] The SCS has criticized the administration of the Agriculture Conservation Program, noting it has been used as much for farm income support and maintenance of a strong political lobby for ASCS as it has been to address soil erosion problems.[127] The ASCS, in turn, resents SCS technical criteria that "gold-plate" conservation work beyond what is needed.[128]

These disagreements sometimes culminate into blatantly contradictory policies. For example, it was common for the ASCS to cost-share on the expense of weed killing chemicals and summer fallow as "conservation measures."[129] Summer fallow is a popular cultivation method involving clean cultivating a field all summer long to conserve moisture for the following year's planting. The practice has also been recognized as one of the single greatest contributions to excessive soil erosion during the winter and spring months. After the soil has been plowed and pulverized all summer long, there is virtually no resistence to wind and water erosion. It would be extremely frustrating for SCS soil technicians to preach that summer fallow should be stopped while an ASCS subsidy program was promoting it in the name of "conservation."

Whether the combination of budget restraints or increased Congressional scrutiny and interagency inefficiency will lead to a massive reorganization of the ASCS remains to be seen. Two factors suggest otherwise. First is Congress' own failure to eliminate contradictory conservation incentives from programs other than those under the USDA. For example, certain exclusions from gross income of cost-share payments for conservation measures are allowed by the Internal Revenue Code.[130] At the same time, tax shelter investors are encouraged to invest in these agriculture shelters that reward the farming of marginally productive and highly erodable land by increasing write-offs for soil loss.[131] Second, the Reagan Administration budget propos-

124. In the Agricultural and Food Act of 1981, the Reagan Administration proposed, and Congress authorized, matching block grants to states. 91 Pub. L. No. 97-98 §§ 1514-1519, 95 Stat. 1333-35. The proposal is commonly called the "Preferred Program."

125. *Soil Conservation Programs Admist Faltering Environmental Commitments*, *supra* note 9, at 686, 694.

126. Every Secretary of Agriculture, from Henry Wallace to Bob Bergland, has been concerned with, but failed to find a solution for, the "jury-fighting" within the USDA over the soil conservation effort. FARMLAND OR WASTELAND, *supra* note 14, at 264.

127. *Id.*

128. *Id.*

129. *Id.*

130. *See* I.R.C. §§ 175, 182 (1982).

131. *See* Dentzer, Weathers and Leslie, *Harvesting the Tax Code*, TIME, Mar. 18, 1985, at 54.

als suggest a trend toward more targeting of critical erosion problems. Reliance upon SCS technical expertise would hamper targeting because personnel compensation constitutes the bulk of the SCS budget.[132] Moreover, personnel are very difficult to quickly direct to erosion problem areas. The cost-sharing ability of ASCS, on the other hand, provides matching grants to states that enhance flexibility and promote effective state and local management. Therefore, it would seem logical that the ASCS and its Agriculture Conservation Program would win in a bidding war with Congress.

Logic has never dominated soil conservation planning, however. As one veteran observer of the ASCS and the Agriculture Conservation Program noted: "ACP has many friends in Congress, and it is hard to imagine they would abandon the program . . . ."[133] The same person recalls, however, that

> [t]he evaluation of the Great Plans Program in 1974, . . . suggested that a reallocation of funds among the states could significantly improve the program's effectiveness in reducing erosion. ACP doubtless could be improved in the same manner. The Great Plans funds were never reallocated, and it is not expected that a reallocation of ACP monies will be proposed by the [USDA] or cordially received on the Hill.[134]

Veteran observers suggest, nevertheless, that the program's new direction will be toward a strengthening of state and local programs.[135] Given the history of past inefficiencies of the SCS and ASCS, many are hopeful this process will occur. Recently proposed block grants from the federal to state governments for soil conservation programs may be the answer for which states are looking.

STATE SOIL CONSERVATION PROGRAMS

With hints that the ASCS's budget could be cut by two-thirds by 1987, the states may not have any option but to assume the obligation of preserving their soil resources.[136] Should they choose to do so, states have several opportunities to improve on the federal record. First, in developing an effective approach to soil preservation, an understanding of the reasons for the shortcomings of federal initiatives over the past half-century should be helpful in designing new programs. Second, states are much more familiar with the intricacies of efficient soil management, such as soil type, weather conditions, local economy, agriculture practices and pre-existing attitudes. South Dakota, for example, has 525 soil types and its precipitation ranges from 14 inches in the northwest, to 25 inches in the southeast.[137] Obviously, soil management

132. *Planting Less Can Save Soil, Congress Told*, Sioux Falls Argus Leader, April 16, 1985, at 1C. col. 4.

133. Batie, *Policies, Institutions and Incentives for Soil Conservation*, SOIL CONSERVATION POLICIES INSTITUTIONS AND INCENTIVES 31 (1982). [hereinafter cited as *Policies, Institutions and Incentives*].

134. *Id.*

135. *Id.*

136. The Reagan Administration has proposed cutting the Soil Conservation Service by two-thirds by 1987; *See* note 132.

137. *Report for Fiscal Year 1983*, SOIL AND WATER CONSERVATION IN SOUTH DAKOTA, Soil Conservation Service (1983).

techniques would have to be extremely flexible to adapt to such a wide range of conditions. Conservation districts and county committees are a federal attempt to address this need, but these organizations still must respond to policy set in Washington.[138]

Finally, states should exceed the federal success rate because they are best able to target resources to critical areas in need—something at which the federal government is inept. At the federal level, funding is disbursed not according to need, but primarily in response to political influence, with each congressional district receiving a "fair-share" regardless of need. Hopefully, the Reagan Administration's "preferred program" via block grants will alleviate this inherent deficiency by making funds available to states on a need basis.[139]

As a general rule, the states have not done well in their erosion control programs. Iowa and South Dakota are usually considered to be exceptions to the general rule, although a few additional states have the potential to approach their status.[140] The trend seems to be, however, toward states assuming the role of management and control over programs. If so, states must find an effective balance between regulatory and nonregulatory programs, financial incentives and assistance and educational support. Above all, states must commit themselves to *planning* their approach to soil conservation.

Conservation Districts

Although conservation districts are creatures of federal legislation, they are generally considered subdivisions of the state and local government in their exercise of public powers.[141] State legislatures have the power to create soil and water conservation districts whenever it is deemed necessary or appropriate.[142] As governmental subdivisions under state control, they are authorized to exercise over the territory within their boundaries the complete range of governmental powers which the state itself may exercise.[143] The state legislature has the authority to confer broad or narrowly defined powers upon governmental subdivisions as they see fit.[144] Therefore, districts are most likely to become the instruments by which states assume future conservation responsibility.

Traditionally, governmental authority is considered to be divided into legislative, executive, and judicial powers.[145] Since conservation districts are not merely administrative boards, but rather governmental subdivisions, all

138. FARMLAND OR WASTELAND, *supra* note 14, at 266.

139. *See supra* note 124; *Soil Conservation Amidst Faltering Environmental Commitments*, supra note 9, at 656-57.

140. *Erosion—The Next Crisis?*, *supra* note 10, at 582.

141. S.D.C.L. § 38-8-15 (Supp. 1982).

142. S.D.C.L. § 38-8-4 (Supp. 1982).

143. Massey, *Land Use Regulatory Power of Conservation Districts in the Midwestern States for Controlling Non-point Source Pollutants*, 33 DRAKE L. REV. 52 [hereinafter cited as *Land Use Regulatory Power of Conservation Districts*]. *See also* SCHWARTZ, ADMINISTRATIVE LAW, § 11 (1976).

144. SCHWARTZ, *supra* note 143, at § 11.

145. *Id.*

three powers may be conferred upon them.[146] Consequently, the requirements of separation of power applicable to states through their individual constitutions is not applicable to their governmental subdivisions.[147] In other words, the governing board or committee of a government subdivision may exercise legislative, judicial and executive power's. However, states have typically chosen to retain the judicial powers in local courts, and allow conservation district boards of supervisors to act as both legislative and executive branches of the district government.[148]

In the exercise of their legislative and executive functions, South Dakota conservation districts are able to apply a combination of three institutional tools for controlling agricultural soil erosion. The first tool restricts certain types of agricultural activity on specific land by way of land use prohibitions.[149] The permissive regulation of land use activities is the second method.[150] The voluntary approach to soil conservation through a series of incentives is a third means for districts to exercise their power. A discussion of each method follows.

District's Authority to Exercise Land Use Prohibition—Mandatory Regulatory Powers

The primary basis of state land use statutes or regulatory codes is the Standard District Law and Model State Act for Soil Erosion and Sediment Control.[151] The states' authority to enforce enabling legislation originates from the Model Acts at the federal level and the police power at the state level. A state's police power is that which is exercised to protect and promote the public health, safety and morals and general community welfare.[152] Land use regulatory and prohibitory statutes are considered to be within the state's police power because they are similar to regulations that conserve limited natural resources and food supply, aid in preserving wildlife, protect public lands and highways, conserve water supplies, and prevent impairment of dams and reservoirs.[153]

South Dakota is unique in that it provides a combination of enforcement and penalty provisions to enforce conservation measures. The state Conservation Commission is required to prepare statewide erosion and sediment control programs and guidelines, and the soil conservation districts are *required*

146. *Id.*

147. *Land Use Regulatory Power of Conservation Districts*, supra note 143, at 52. *See also* S.D.C.L. § 38-8-49 (Supp. 1982).

148. *See* S.D.C.L. §§ 38-8A-5 to -21 (Supp. 1982).

149. *See* S.D.C.L. §§ 38-8A-3 to -26 (Supp. 1982). Certain lands, because of soil conditions, rainfall and extreme slope may be deemed unsuitable for cultivation because of the impossibility of controlling soil erosion.

150. Of the states that have established permissive regulatory programs, the local authorities have failed almost universally to exercise their power and adopt regulations. *Soil Erosion*, *supra* note 3, at 579.

151. *See supra* note 59.

152. *Land Use Regulatory Power of Conservation Districts*, supra note 143, at 53.

153. *Id.*

to adopt conservation standards and regulations within those parameters.[154] The South Dakota Act to Regulate Land-Disturbing Activities requires the commission to prepare guidelines which govern district regulations.[155] The Conservation Commission has developed comprehensive statewide erosion and sediment control "recommendations."[156] In South Dakota, the recommendations have lead to the adoption of conservation standards that are based on soil loss tolerance limits on a district by district basis.[157] All conservation districts in South Dakota, except two, have adopted district conservation standards in cooperation with local government.[158]

A second method emphasizes the regulation of agriculture in order to mandate erosion control. Iowa was the first state to enact statewide sediment control statutes to regulate agriculture, and the program now serves as a national model.[159] The provisions were enacted in response to the rapidly rising costs of erosion and the failure of voluntary programs to address the problem. The distinguishing factor of Iowa's program is that district commissioners classify the land within their districts in relation to soil loss limit requirements.[160] The district then adopts regulations to enforce its loss limitations.[161]

A third category of soil conservation statutes requires that state agencies adopt land use regulations that are then enforced by the state agencies and local governments. The two states that fall into this classification, Michigan and Ohio, establish "technically feasible" and "economically reasonable" criteria for conservation measures.[162]

DISTRICT'S AUTHORITY TO REGULATE CONSERVATION PRACTICES—MANDATORY REGULATORY POWERS

South Dakota land-use regulations are conservation practices that may be collectively classified as a mandatory erosion control program. The regulations are based on a combination of soil loss tolerances and conservation standards for land disturbances.[163] District supervisors prepare and adopt conservation standards or tolerance limits consistent with erosion control and in accordance with the state conservation commission's guidelines.[164] The commission's guidelines suggest recommended soil loss limits based on "rele-

154. S.D.C.L. §§ 38-8A-3 to -26 (Supp. 1982).
155. S.D.C.L. §§ 38-8A-3,-6 (Supp. 1982).
156. S.D.C.L. §§ 38-8A-4,-5 (Supp. 1982).
157. *Id.*
158. S.D.C.L. § 38-8A-6 (Supp. 1982).
159. *Soil Erosion*, *supra* note 3, at 581.
160. "Soil loss limit" means the maximum amount of soil loss due to erosion by water or wind, expressed in terms of tons per acre per year, which the commissioners of the respective soil erosion conservation districts shall determine is acceptable to meet the objectives of the conservancy district law. IOWA CODE § 467A.42(1) (1983).
161. IOWA CODE § 467A45 (1983).
162. Michigan Soil Erosion and Sedimentation Control Act of 1972, as codified in MICH. COMP. LAWS §§ 282.101-.117 (Supp. 1983-84); Ohio Soil and Water Conservation District Law, as codified in OHIO REV. CODE ANN. § 1511.02 (Page Supp. 1982).
163. *See supra* notes 154 to 158 and accompanying text.
164. S.D.C.L. § 38-8A-6 (Supp. 1982).

vant physical and developmental information concerning watersheds and drainage basins," including land use data, soils, geology and other characteristics that may be deemed appropriate by the commission or may be required by law.[165]

Significantly, the South Dakota guidelines include standards that may be applied to specific erosion problems and soil loss tolerance values, soil erodibility factors and ratios of soil loss tolerance to soil erodibility by texture and percent of slope for each of the soils in the state.[166] Local ordinances that have been adopted by county commissions incorporate district conservation standards governing agricultural land-disturbing activities, minor land-disturbing activities and nonagricultural land-disturbing activities.[167] Normally, persons engaged in agricultural or minor land-disturbing activities are not required to obtain a permit, nor report their activities, unless they are in violation of the district's loss standards.[168] Non-agriculture activities that may be subject to a permit under local ordinances for other purposes must adhere to the district's soil loss standard and a conservation plan must be filed before beginning the activity.[169]

During the 1984 legislative session, South Dakota adopted an amendment to its land-disturbing activities law regulating the conversion to cropland of any land which has been designated "fragile land."[170] This amendment may require the submission of a plan to the district.[171] The amendment places the statute in the gray area between permissive and mandatory regulations, but allows the district board of supervisors the means to prevent a potentially massive soil loss.[172] Even though the amendment is not framed in mandatory terms, the district is given the authority to act to prevent soil erosion rather than wait to take action after the damage has occurred.[173]

Another important group of statutes was enacted during the same session that allows the district to stop the erosion of soil by requiring the occupant to practice conservation measures.[174] If the occupant refuses to comply with the request, the board of supervisors has two options: it may prescribe treatment to prevent erosion,[175] or if it finds that an emergency exists, the board may contact the county commissioners, who shall issue an order.[176] Once the order is issued, it must be complied with or the board may perform the treat-

165. S.D.C.L. § 39-8A-5 (Supp. 1982).
166. S.D.C.L. §§ 38-8A-4,-5 (Supp. 1982).
167. A Local Ordinance of the Control of Erosion and Sedimentation § 3(11), in S.D. STATE CONSERVATION COMM'N & S.D. DEPT. OF AGRICULTURE, SUGGESTED GUIDELINES FOR LOCAL EROSION AND SEDIMENT CONTROL PROGRAMS. (1977).
168. S.D.C.L. § 38-8A-17 (Supp. 1982).
169. S.D.C.L. § 38-8A-16 (Supp. 1982).
170. S.D.C.L. § 38-8A-17 (Supp. 1982).
171. S.D.C.L. §§ 38-8A-17 to -26 (Supp. 1982).
172. S.D.C.L. § 38-8A-23 (Supp. 1982).
173. S.D.C.L. § 38-8A-22 (Supp. 1982).
174. S.D.C.L. § 38-8A-23 (Supp. 1982).
175. *Id.*
176. S.D.C.L. § 38-8A-24 (Supp. 1982).

ment, upon notice, and assess against the land the cost of treatment.[177]

Other Conservation Incentives—State Action

States may use other incentives to enhance soil conservation. The important areas are tax policies, tenure arrangements and banking policies. Each provides an opportunity for states to implement innovative incentive tools in a balanced conservation plan.

1. Tax Policies

Tax policies indirectly encourage or discourage soil-depleting practices even though such implications may have never been intended. Congress is beginning to investigate national tax policies that are contradictory to the intent to conserve soil.[178] States also have the opportunity to positively influence soil preservation, or at least remove those policies that reward erosion. Foremost in influencing conservation practices are tax advantages encouraging agriculture land speculation.[179] These include the privilege of any prospective capital gains, deductability of interest on borrowed funds as a business expense, a tax write-off, investment tax credit and accelerated depreciation.

As a positive incentive, tax policies can encourage conservation, at least for those farmers and ranchers in marginal tax brackets. For example, farmers and ranchers have been allowed to consider certain investments in soil conservation practices as current expenses to be deducted at up to 25% of gross farm income.[180] In addition, cost-sharing programs at the state level may include provisions that payments for soil conservation practices need not be included as individual gross income for federal tax purposes.[181] National tax policies have also reduced estate taxes resulting in more intergenerational transfers which encourages long-term conservation investment.

Another possible tax incentive in South Dakota is to redefine the factors used in determining assessed valuation. In South Dakota, assessed valuation is based on the capacity of the land to produce agriculture products, which may run counter to promoting conservation programs in that the more care given land, the higher its assessed value.[182] To neutralize this affect, however, South Dakota has passed a model statute providing that agriculture land be valued and taxed without regard to zoning classification.[183]

2. Tenure Arrangements—*Moser v. Thorp Sales Corp.*

It is said that man, rather than nature, inflicts the greatest amount of

177. S.D.C.L. §§ 38-8A-25, -26 (Supp. 1982).
178. *See supra* note 131 and accompanying text.
179. *See supra* note 1; Batie, *Policies, Institutions and Incentives*, *supra* note 133, at 36-37.
180. *Id.*
181. *Id.*
182. S.D.C.L. §§ 10-6-33.1-.2 (Supp. 1984).
183. S.D.C.L. § 10-6-31.1 (Supp. 1984).

damage to the land in the form of erosion.[184] Upon this premise, economic theory holds that insecure property rights lead to the premature depletion of resources. Therefore, the land of absentee owners, tenant occupied land, and land which was or has become sub-marginal is more prone to misuse. Added to this list is land acquired by adverse possession or trespass. In the landmark decision of *Moser v. Thorp Sales Corp.*, the Iowa Supreme Court held that individuals in possession of land owned by someone else may be liable for the soil erosion caused by their unreasonable agricultural practices.[185]

3. Financial Institution Policies

Very few banks or other lending institutions consider soil conserving practices when loaning funds for the purchase of new farm or ranch land or for operating expenses. If lending institutions required such practices as a prerequisite to obtaining loans, land values would correlate to conservation practices.[186] Moreover, lending policies often times encourage speculation in land investments. Such policies lead to a misuse of land or a discontinuation of conservation practices.

Regulatory Authority—Unexplored Potential

As states gradually assume more responsibility in soil trusteeship, they should not rely on an all-out statutory blitz to enforce conservation policies. States have at their disposal "new" and relatively unexplored authority to enforce soil erosion statutes and public policy applying to conservation. These two areas are really not new, but rather redefinitions of existing law that has resulted in an expanded interpretation.

The Iowa Supreme Court examined the scope of the states' ability to enforce conservation statutes through its police power in *Woodbury County Soil Conservation District v. Ortner.*[187] In that case, the court held that a landowner required to adopt soil conservation practices is not entitled to compensation unless he can prove economic damages beyond the public's interest in preserving the soil as a natural resource. The holding recognizes that the public interest in soil preservation warrants the use of land use planning or required soil conservation to control or prevent agricultural erosion. Potentially even more important is the court's dictum which suggests that Iowa's soil conservation districts could act on their own initiative to require landowners to comply with soil loss limits.[188]

The other area to emerge as a "new" source of enforcement of public policy is the public trust doctrine. As with the police power in *Woodbury County*, the public trust doctrine has existed for some time, but its parameters

184. Note, *Moser v. Thorp Sales Corporation: The Protection of Farmland from Poor Farming Practices*, 27 S.D.L. REV. 513 (1982).
185. 312 N.W.2d 881 (Iowa 1981).
186. Batie, *Policies, Institutions and Incentives, supra* note 133, at 37.
187. 279 N.W.2d 276 (Iowa 1979).
188. *Id.* at 278-79.

have never been fully explored. As with many conservation issues facing us today, individuals have interpreted the doctrine as allowing the public an assertable substantive right to the preservation of natural resources. Although the public trust doctrine is not thoroughly developed in South Dakota, its guiding principals are found in various South Dakota statutes and decisions.[189] Specifically, South Dakota's soil conservation enabling statutes recognize the public interest in protecting public lands from the harmful effects of soil erosion.[190] The doctrine is an opportunity for the courts to provide a counterbalance to market forces by treating common resources as assets of the citizens of the state.

CONCLUSION

Until the states assume responsibility for soil conservation, our nation remains at risk of losing its most precious natural resource. Despite a half-century of attempts by the federal government to manage the problem, the effort has fallen significantly short of developing an effective conservation plan. Today, erosion remains at Dust Bowl levels in some areas. Federal programs have departed significantly from their original congressional intent in order to expand their political base. In their modern form, soil conservation programs may entail anything from fish habitat restoration to weed control cost-sharings.

The federal approach to soil conservation is inherently defective. Rather than awarding funding and technical assistance on the basis of need, it is usually in response to political forces. The result is a self-perpetuation of programs that spread the potential benefits so sparsely that efforts are wasted. In the meantime, the agencies responsible for erosion control, the SCS and ASCS, plead for more funding, incognizant of their flawed approach that stems from the very basis of their programs.

States are in a much more advantageous position to remedy the erosion problem. First, they are best able to adapt their individual programs to fit their particular needs. Thus, they will target critical need areas much more efficiently with programs based on an economic benefit-cost analysis. Second, the states have a considerable amount of federal experience to build and improve upon. Finally, the enforcement mechanisms available to states allow them to exploit their authority much more flexibly and efficiently than the federal government. A state is able to provide a balance of mandatory regulations, prohibitory practices, and innovative incentives to encourage soil conservation.

Although the situation is not as grave as some would suggest, there exists a moral obligation for states to adopt effective, efficient, long-term conservation planning. If Thomas Jefferson's prophecy that a nation's wealth is mea-

189. *See, e.g.*, S.D.C.L. ch. 34A-10 (Supp. 1983); Flisrand v. Madsen, 35 S.D. 459, 152 N.W. 796 (1915).

190. *See, e.g.*, S.D.C.L. § 38-8-2 (Supp. 1982).

sured by the depth of its top soil is true, then indeed it is also true that a state's future may be measured by the depth of its top soil.

KENNETH E. BARKER