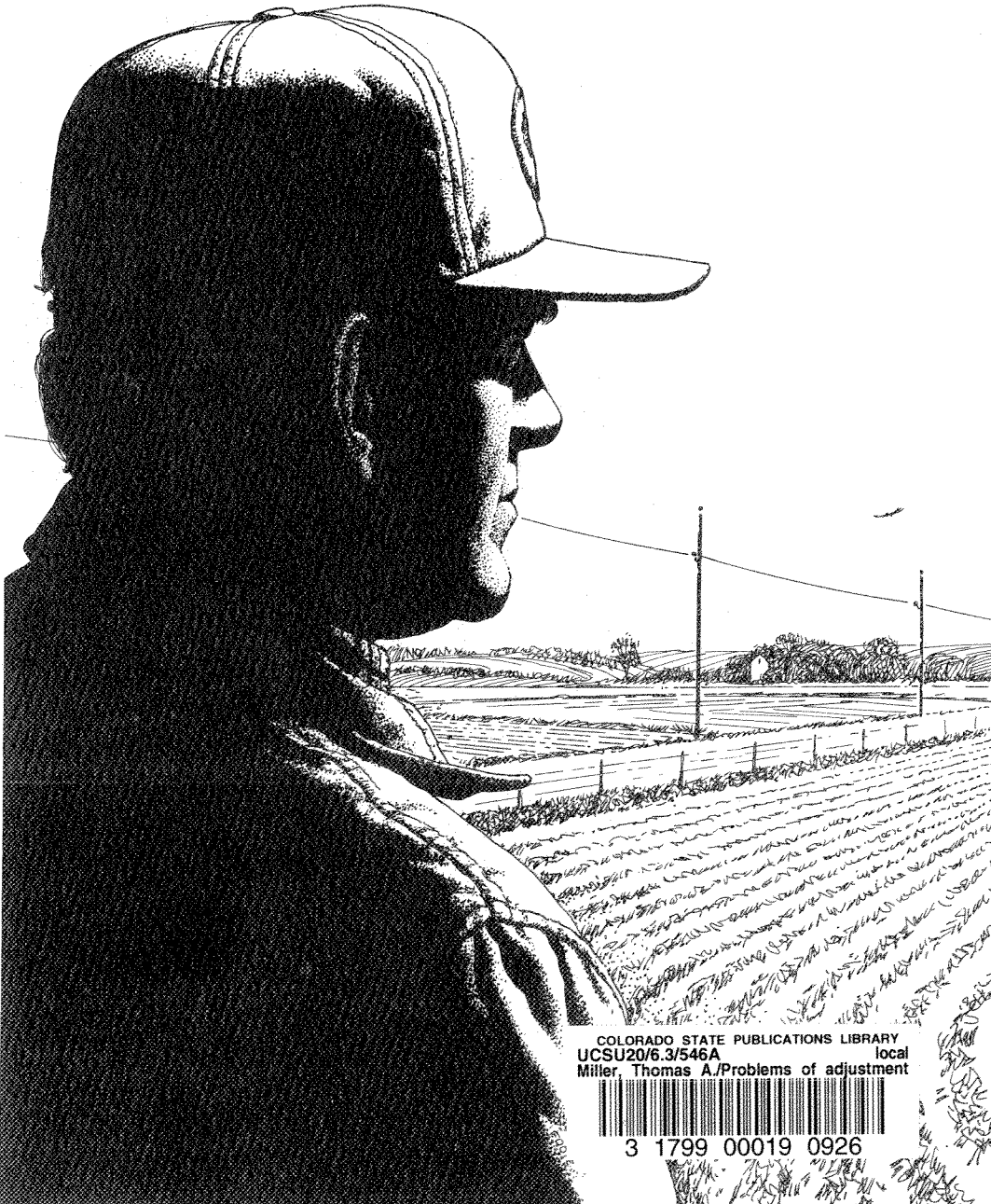


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PROBLEMS OF ADJUSTMENT: THE AGRICULTURE OF THE GREAT PLAINS

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**PROBLEMS OF ADJUSTMENT:
THE AGRICULTURE OF THE GREAT PLAINS**

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This publication has as its basis a paper presented by Thomas A. Miller at a Symposium on Surplus Capacity and Resource Adjustments, St. Louis, Missouri, January 24, 1989 and other papers in a Symposium Proceedings, The Rural Great Plains of the Future, Denver, Colorado, November 3-5, 1987.

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Problems of Adjustment: The Agriculture of the Great Plains

Adjustment to changing conditions in agriculture has been a problem of overriding concern to farmers and ranchers in the Great Plains for many years. There has, of course, been the necessary preoccupation with the physical and biological factors that have affected production of crops and livestock--variable precipitation, insects and diseases, hail and windstorms, and assorted other natural phenomena. But additionally there have been other factors that have commanded the attention of producers--changing technology, increased capital requirements, changing domestic and international markets for agricultural commodities, an evolving agricultural policy and ever-expanding requirements for management of enterprises.

It has been argued that farmers in the region bear a greater burden of adjustment than do farmers producing competing crops in other regions. Over the years considerable evidence supports these arguments. For example, there have been larger concentrations of land in soil banks and conservation reserves in the Plains than there have been in other regions (ASCS, 1988). Structural changes (numbers and sizes of farms) in agriculture and associated changes in rural communities rival, if not surpass, such adjustments in other regions (Hewes; Vermeer and Slaughter).

It is with recognition of constantly changing conditions and the problems of adjustment that this report is written. Included is a review of (1) the forces of change and adjustment, (2) unique features of the plains that affect the region's ability to adjust, (3) some significant adjustment problems and issues, and (4) resulting implications for agricultural policy. Adjustments are often painful; attempts to ameliorate adverse impacts via policy are of critical interest. The objective of this report is an improved understanding of issues and problems so that policy options can be critically evaluated for their relevance to adjustment needs and processes.

The Forces of Change

Not all forces contributing to change are of equal importance, and some are not obviously significant to agriculture. A review of important ones is instructive.

Declining Real Farm Prices. While the important export markets are expected to grow at an average rate of 3 percent annually, productivity gains in the United States will continue to outpace demand expansion to the year 2000. This supply-demand relationship should be sufficient to avoid major problems of downsizing of the agricultural plant, but it will not be sufficient for an improvement of real commodity prices. In fact, the trends suggest continued declines in real commodity prices, as has been our experience in the past (Tweeten, 1988b).

Variability of Prices. In an important recent publication, Tweeten observed that while the prospect for a major upward or downward trend in real farm prices is small, a realistic expectation is increased variability in prices (Tweeten, 1988b). Contributing importantly to such variability will be annual and cyclical fluctuations in the demand for U.S. exports. Importing practices of the centrally planned economies will be a continuing

source of instability in world grain prices. Changing needs and capabilities for food purchases among developing nations will also contribute to the variability of exports.

Changes in Economic Variables and Financial Markets. The agriculture of the Great Plains has made important adjustments to changed economic and financial variables of the early 1980s. Affected have been land values, farm incomes and balance sheets. But the forces behind these adjustments are not gone--they stem from underlying changes in the general economy and in U.S. and world financial markets. Monetary and fiscal policies have been recognized as forces important to the agricultural sector as they affect economic growth, interest rates, inflation and exchange rates (Schuh, 1988). Financial markets have become more volatile with deregulation of U.S. and world financial practices and instruments. Costs and availability of capital used in agriculture have been impacted. These forces have acted to increase the financial risks faced by U.S. farmers and agricultural lenders. They will remain an important factor in the management of agricultural enterprises and the economic health of the industry (Miller, et al., 1985b).

Changes in Technology. Technology has long been an important force affecting the structure and competitiveness of U.S. agriculture (Knutson & Richardson, 1987). Over the next 15 years, biological and information technologies will generate additional changes in the structure and efficiency of the industry (Office of Technology Assessment). While these technologies will be critical to our continued competitiveness in the international marketplace, the consequences will be a continued push toward commercial farm units, more emphasis on management skills, and additional pressure toward a new financial structure with more complex business arrangements in production-marketing processes.

Excess Capacity in Agriculture. Some observers of the agricultural scene are impressed with the current excess capacity in U.S. agriculture and they argue the eventual necessity for downsizing the sector to match market demands. But two analysts argue that (a) surplus production results mainly from government price supports which are above market clearing levels (Paarlberg, 1982), and (b) anticipated overall growth of agricultural exports (3 percent annually) is sufficient to avoid major downsizing of the agricultural plant (Tweeten, 1988b). A reasonable conclusion is that reduction of price support levels will provide for increased export sales, so that significant reductions in output and changes in resource use will not be necessary adjustments in agriculture of the Plains.

Loan Rates Below World Prices. The 1985 Food Security Act reflected the judgment of Congress that it makes little sense to restrict domestic production and hold grain prices above world market levels, just because of market imperfections. Thus the Legislation allowed a gradual reduction of commodity loan rates to below market clearing levels with provisions for relaxation of production limitations. This policy direction is likely to be reaffirmed in the future, with the commodity loans providing only a price "safety net". The consequences are expected to be reduced commodity prices but increased export sales, with opportunity and reason for expanded output. Increases in excess capacity can be avoided by developments such as these.

Pressure to Reduce Government Involvement and Costs. The continuation of federal budget deficits is a cause for increasing calls for reduced agricultural program spending. At the international level, multilateral trade negotiations have emphasized

reduced barriers to trade, including a proposal for decoupling of price support and related programs from production and pricing decisions (Trock, 1989). U.S. farmers should take notice of these pressures against current farm programs. Grain producers, and especially wheat producers in the Plains, could be severely impacted by significant reductions in the benefits of commodity programs. Farm and commodity organizations, agribusiness entities and others should consider carefully the consequences of such developments as marketing loans, reduction or elimination of deficiency payments, triple base allotment programs and others.

Adjustment to Free-Market Prices. There is concern about the multilateral trade negotiations which are on-going and the prospect for liberalized trade. Some fear the effects of reduced price support levels; there is uncertainty about the levels of free-market prices. The judgment of most analysts is that trade liberalization will result in higher world prices for all major agricultural commodities (Baker, et. al., 1989). Because U.S. prices for wheat and feed grains presently follow world prices, as a consequence of reduced loan levels of the '85 Food Security Act, there would seem to be a reasonable prospect for higher, domestic commodity prices. But Drabenstott and Barkema suggest that adjustment to liberalized trade, even with higher prices, will depend on the rapidity of trade growth (Drabenstott and Barkema, 1989). Rapid trade growth with a market-oriented farm policy will give U.S. and Great Plains agriculture its greatest competitive advantage. But sluggish trade growth, even with a market-oriented policy will reduce competitiveness and aggravate adjustment problems.

Uniqueness of Great Plains Agriculture

A number of rather unique features affect the ability of agriculture in the Plains to make adjustments to the aforementioned forces. These features either make adjustments more difficult or they create special policy issues and needs.

Depressed Regional Economy. The current expansion of the U.S. economy is in its sixth year and is the longest peacetime expansion in history. Table 1 contrasts growth in the Great Plains with overall U.S. growth rates during the last four years. Comparison of rates of growth of gross state products of Great Plains states and the U.S. gross national product in column one reveals a slower rate of growth among the 10 Great Plains states. Data in the second and third columns contrast growth rates in non-farm personal income and non-farm employment. It is evident that the region has produced new jobs at less than half the rate of the nation. Three states even lost jobs in the past year.

The Great Plains has been severely impacted by declines in the oil, gas, mining and construction sectors. In Colorado, for example, employment in these sectors declined from 125,200 in 1982 to 81,300 in 1988, a decline of 35 percent (Colorado Business/Economic Outlook Forum, 1988). This decline in employment places a severe constraint on the ability of the non-farm economy to absorb labor which is displaced by agriculture as a consequence of adjustment. Continued farm consolidation throughout the region will emphasize the problem of limited employment opportunities in counties with depressed economics.

Table 1. Indicators of Economic Growth Rates in the Great Plains States Compared to Averages for the United States.

State or Region	Gross State Product 1982-1986	Non-farm Pers. Income 2nd Qtr. '87- 2nd Qtr. '88	Non-farm Employment 8-87 to 8-88
	(Percent change)		
North Dakota	4.3	4.8	1.2
South Dakota	25.1	5.6	1.9
Nebraska	24.8	6.7	1.3
Kansas	27.6	5.3	2.4
Oklahoma	2.3	5.5	0.4
Texas	19.3	5.8	1.9
Montana	10.5	4.2	-0.1
Wyoming	-10.6	2.2	-1.7
Colorado	30.8	5.3	-0.4
New Mexico	17.9	5.5	2.2
Ten Great Plains States	18.8	5.6	1.4
United States	35.0	7.7	3.7

Source: U.S. Department of Labor; U.S. Department of Commerce

Farm- and Farm-Export-Dependent Counties. The region has a high proportion of farm-dependent counties (311 in the Plains states in 1979) and a small number of farm-export-dependent counties (Bender, et al., 1985). Approximate locations of these counties are in Figures 1 and 2.² This characteristic is significant to the capacity of the region to accommodate change--that which has been noted as accompanying adjustments in agriculture.

Rural counties in the Great Plains states have historically exported raw materials--agricultural produce, timber, minerals and educated young people. In such extractive, export-oriented economies retained resources and profits tend to be limited and capital accumulation difficult. Past declines in farm numbers and substitution of capital for labor have depopulated much of the region, decreased the number of small trade centers, and severely strained the abilities of institutions like schools and local governments to function. Increasing distances to employment centers are making labor adjustments more difficult.

Variability and Risks in an Arid Agriculture. Variability of precipitation in the semi-arid environment of the Plains is well-known. Its pervasive impact on farm operations, output of crops and commodity sales is never forgotten by the good managers. In this risky environment, managers often require an additional risk premium as they contemplate investments and make decisions about resource use and enterprise combination.

In recent years a requirement to deal with an increasingly unstable market environment has been added to this high background level of natural risk. Expanded agricultural exports have required that we deal with economic and political forces and marketing practices and processes with which we have had little experience. Producers and agribusiness people in the Plains may have difficulty adapting to this added risk. Education and experience will be essential to successful future competition in international markets.

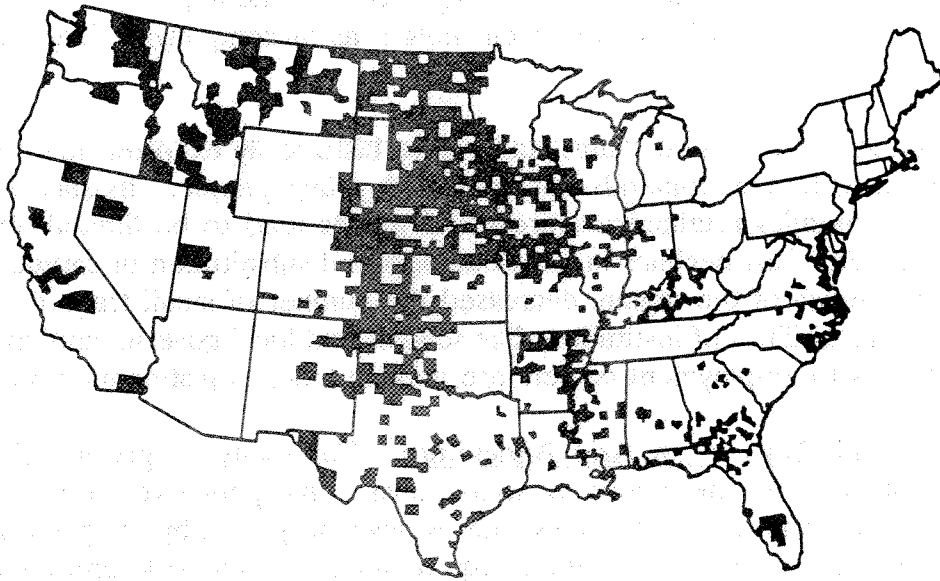
Vulnerable Large-Farm Financial Structure. Significant structural features of agriculture in the Great Plains are (1) a very high percentage of farms in a vulnerable financial position, (2) a decline in land values in the region which has been as large as anywhere in the United States, (3) dominance of large farms in the region, (4) dependence on government payments for a significant proportion of farm income, and (5) dependence on crops for which export sales are important (Harrington, 1987). Such structural features make the agriculture of the region vulnerable to such political and economic changes as: changes in commodity policy affecting price support levels and net farm incomes; changes in monetary policy causing increases in interest rates and debt costs; and changes in trade policy which cause exports expansion and increases in commodity prices.

These structural features may limit the ability of the region to make adjustments appropriate to both expected and unanticipated changes in policies and economies.

²Farm-dependent counties: at least 20 percent of these counties' total income in 1975-79 was comprised of labor and proprietor income from farming.

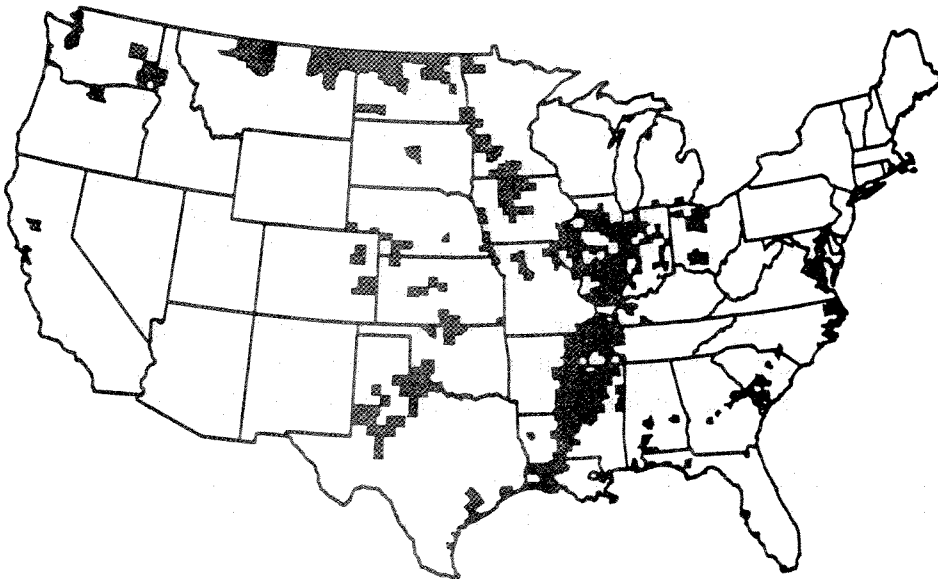
Farm-export-dependent counties: those counties in which 50 percent or more of total farm sales were sales of corn, wheat, soybeans, cotton and rice in 1982.

Figure 1. Farm-Dependent Counties



Farm-dependent counties are those where farming contributed a weighted annual average of 20 percent or more to total labor and proprietor income, 1975-79.

Figure 2. Non-metro Counties Dependent on Exports



The 419 export counties are those with 50 percent or more of total farm sales from corn, wheat, soybeans, cotton and rice in 1982.
Source: 1982 Census of Agriculture.

Plains Agriculture--the Marginal Adjuster. The peculiar characteristics of agriculture in the Plains have, in the past, made it that segment of U.S. agriculture within which the marginal adjustments to change have been made. When there have been significant changes in markets for commodities, in policies and programs for agriculture, or in other circumstances affecting most of the industry, the larger, relative changes in crop acreage, livestock numbers, land use, etc. have been in the Plains. Agriculture of the region has often been characterized as being at the "extensive margin" with respect to cropland and pastureland.³ As a consequence, the region often must make the larger adjustments, even though there are important, internal limits on the ability to adjust. These limitations make supportive local, state and federal agricultural and other policies vital to maintenance of agriculture in the Plains. Significant reductions in benefits of commodity programs would have serious impacts on agricultural enterprises.

Adjustment Issues in the Region

Two kinds of adjustments seem particularly important to the agriculture of the Plains: adjustments in the quantity of production and the productive capacity of the region, and adjustments in income, farm structure and asset values. Such adjustments will also affect rural communities, which are both supportive of and dependent on agriculture.

Production Adjustments. If history is any indication of capacity of the region to accommodate change, adjustment to anticipated trends in (world) commodity markets will be little problem. As an example, cropland acreage in the Northern and Southern Plains increased by 12.4 percent in the period 1972-81, an era of significant growth in exports of agricultural commodities (ERS-USDA, June 1988). This experience is convincing evidence of the region's capacity to adjust resource use in response to changed demand for commodities. With respect to long run trends in demand for such commodities as grains, oilseeds, cotton and rice, few problems of adjustment are perceived by most analysts.

Coping with prospective variability around the trends in commodity markets may present more of a problem. U.S. wheat and feed grain producers have long contended with annual and cyclical instability in production. The variability in export markets, which will be expressed in fluctuating local prices, will aggravate the problem of production adjustments--though there will be little problem of productive capacity in the longer run. The occasional need to idle resources for short periods presents special problems in the Plains where arid conditions sometimes makes it difficult to establish cover crops.

A viable agriculture in the Plains requires a flexible technology and production plant, a diversified production mix and a resilient financial structure among farms. Existing agriculture may have difficulty measuring up to these requirements. Many farms and ranches follow a monoculture agriculture, lacking diversity; and the financial structure,

³Economists frequently speak of some land areas as being marginal for particular types of use. The usual reference is that the areas fall at or below the no-rent or extensive margins for the particular uses considered (Barlowe).

with many farms at risk, may not contain the reserves necessary to withstand a "roller coaster ride".

A frequently expressed concern is that a boom/bust (demand side) agriculture may place a special burden on Plains-area farmers. If production adjustments become larger problems, it will be due to annual or cyclical variability in demand. Keeping up with longer run trends in demand should be within the capabilities of farmers and ranchers.

Adjustments in Income, Structure and Asset Values. Adjustments to continuing changes in farm programs may be a difficult problem for the region. Though the farm programs have effects on production, the particular concern is with impacts on incomes.

Income supplements, i.e. deficiency payments have become important components of farm incomes for many families. Changes in policy/programs which would reduce income supplements could have important effects on farm and family incomes and net worth. Probably most affected would be larger farms, for deficiency payments are made in proportion to production and most support goes to farmers in higher income classes. There are thus distributional issues which cause concern, especially in the Plains where large scale farming is an important consideration in survival.

The current importance of deficiency payments is shown in Table 2. In 1987 deficiency payments provided 11.4 percent of gross farm income of the region and 45.7 percent of the net farm income (ERS-USDA, 1988b). Deficiency payments are more important to net farm income for the region than they are for net farm income of the United States, i.e. 36.2 percent.

If income supports are capitalized into land values at a rate of 20 percent, as found by Reinsel and Krenz, they become significant to real estate values (Table 2). The contribution of deficiency payments to current real estate values is 17 percent in the 10 Great Plains states, 26 percent in the Northern Plains states, and 13 percent in the Southern Plains states and those mountain states that are a part of the Great Plains.

Since government payments are primarily available to wheat and feed grain producers, these aggregate state comparisons understate the importance to specialized producers of these crops. An illustration of the effect of deficiency payments on net farm income of a wheat producer is in Table 3. The year 1987 is used in the example because it is the most recent year unaffected by the drought. The deficiency payment increased net returns for 100 acres of wheat in northeast Colorado from \$1,412.00 to \$5,363.68, thereby accounting for 73.6 percent of the net returns for the participating wheat producers (Trock, 1986).

Comparison of residual returns to wheat land in Table 3 is even more significant, i.e. \$40.03 per acre with the deficiency payment (a program participant) and -\$0.55 per acre without it. Land values in the area of Colorado represented by the budget were about \$250 per acre in 1987, or \$500 for each acre of wheat (Census of Agriculture, 1987). The data thus suggest an 8 percent return on the land investment for participants in the commodity program in 1987, and no return for non-participants. The comparisons suggest also that land values in many wheat areas would decline at least as much in

Table 2. Importance of Government Payments to Farm Income and Real Estate Value in the Great Plains Compared to Averages for the United States

State or Region	1987 Govt. Payments	Government payments as percent of:		
		Gross Farm Inc.	Net Farm Inc.	Capitalized RE Value ^{1/}
	(mil. \$)	(Percent)		
North Dakota	719.8	22.9	55.4	31.9
South Dakota	504.8	14.9	52.4	32.1
Nebraska	476.1	5.5	23.1	14.4
Kansas	966.3	13.3	57.3	29.0
Oklahoma	362.8	10.4	39.2	14.2
Texas	1,441.2	11.5	38.7	12.3
Montana	352.3	19.0	100.9	18.5
Wyoming	36.0	4.8	58.3	3.9
Colorado	342.0	8.5	44.5	14.6
New Mexico	93.3	7.0	32.0	8.4
Ten Great Plains States	5,294.6	11.4	45.7	17.1
United States	16,746.7	9.9	36.2	16.0

^{1/} Contribution of government payments to real estate values assumes payments are capitalized into land values at a capitalization rate of 20 percent as found by Reinsel and Krenz.

Source: Economic Research Service, U.S. Department of Agriculture.

Table 3. Comparison of Winter Wheat Returns, Program Participation and Non-Participation, Colorado, 1987

Item	Non- Participation	Participation
Acres of Crop (27.5 Percent Acreage Reduction)	100	72.5
Yield Per Acre (bu.)	30	35 ^{1/}
Production (bu.)	3,000	2,538
Local Market Price	\$2.47	\$2.47
Cash Receipts from Crop Sales	\$7,410.00	\$6,268.86
Deficiency Payment on 2,538 Bushels @ \$1.78	--	\$4,517.64
Gross Return	\$7,410.00	\$10,786.50
Cash Expenses (72.5 Acres Under 1985 Act):		
Seed	\$ 250.00	\$ 181.25
Fertilizer and Herbicide	1,063.00	770.68
Fuel, Oil and Repairs	713.00	516.92
Harvest Cost	1,282.00	929.45
Storage Costs (\$.05/cwt/mo. for 6 mo.)	540.00	456.84
Interest on CCC Loan (redeemed after 6 mo.)	--	95.07
Maintaining 27.5 Diverted Acres (\$12.50/Ac.)	--	343.75
Interest on Operating Capital	182.00	150.86
Total Cash Expenses	\$4,030.00	\$3,454.82
Other Fixed Costs (100 Acres):		
Machinery Replacement, Taxes and Insurance	\$1,068.00	\$1,068.00
General Farm Overhead	700.00	700.00
Real Estate Taxes	200.00	200.00
Total Fixed Costs	\$1,968.00	\$1,968.00
Total Direct Costs	\$5,998.00	\$5,422.82
Net Return to Land, Labor, Capital and Mgt.	\$1,412.00	\$5,363.68
Economic (full ownership) Costs, Other Than Land:		
Return to Non-Land Capital (5 percent)	\$ 175.00	\$ 175.00
Operator Labor (\$5.00 per hour)	693.00	643.80
Management and Risk (10% of direct costs)	599.80	542.28
Total Economic Costs	\$1,467.80	\$1,361.08
Residual Returns to Land	\$ -55.80	\$4,002.60

^{1/} Yields on permitted acres typically higher than yields on total acres because of set-aside of inferior land by program participants.

References: Farm Economics, Vol. 7, No. 6, and Selected Crop Enterprise Budgets for Colorado, DARE Information Report 88-7; Cooperative Extension, Colorado State University.

response to an elimination of current income supports as they did to distressing financial conditions of the 1982-86 period.

In spite of the apparent importance of commodity programs to farm incomes, there are some that argue that the agricultural sector is in reasonably good adjustment and that there is evidence that farmers could adjust to reduction or elimination of income supplements. Rates of return to resources on commercial farms in the United States are as high as those earned by similar resources in other uses. In addition, resource uses and prices adjust quickly to new sets of conditions. It is reasonable to presume that resource returns would move quickly to new equilibrium levels if income supplements were eliminated.

The intent here is not to support or oppose income supports, but to call attention to the importance of deficiency payments--to both the agricultural sector and to the total income of many communities. The adjustments, financial and structural, that would be necessary from elimination of such subsidies would be significant.

Community Effects. It is not just farmers and ranchers whose incomes are affected by government payments. In many rural areas significant proportions of total incomes are farm and ranch incomes. The importance of deficiency payments to farm incomes has just been noted. Other payments for land rental, conservation practices and other products and services are important too.

In a recently completed study of farm dependent counties in Colorado, it was found that for the 15 farm dependent counties 19.9 percent of total personal income came from government payments (Miller, et al., 1987). For some counties the contributions of government payments were much higher, ranging up to 44 percent for Kiowa county in the heart of eastern Colorado's wheat area. The individual county proportions were found to be:

Kiowa	44.1%	Dolores	9.9%
Cheyenne	33.2%	Elbert	9.9%
Baca	30.8%	Yuma	8.9%
Washington	28.9%	Saguache	8.7%
Kit Carson	28.6%	Costilla	5.1%
Phillips	24.4%	Crowley	1.7%
Sedgwick	20.0%	Ouray	0.5%
Lincoln	16.3%		

While data for other Plains counties have not been compiled, similar relationships would be expected in those counties where wheat and feed grains are the primary crops. Since government farm payments in Colorado increased from \$153.6 million in 1984 to \$342.0 million in 1987, the percentages would undoubtedly be higher in 1987. But the data from the study cited suggest a very important link between the economic well-being of rural communities and government payments to farmers. Elimination of such payments could potentially reduce total personal income within many farm-dependent counties by up to one-half. While there are only a few hundred such communities in the Great Plains, the adjustment problems created would surely be severe.

Deficiency payments made under current commodity programs make up an important share of the region's farm income, not only on specialized wheat farms but in the aggregate. Eliminating these payments would severely affect the income, investment returns, resource values and financial well-being of farmers, and it would significantly depress the income and economic health of farm-dependent rural communities. Impacts of adjustment would be especially severe in the first few years after elimination of these payments, and they would affect especially the current owners of farm assets.

Implications for Policy

Farmers and ranchers in the Plains need supportive local, state and federal policies in order to keep up with changing technology, markets and economic and financial conditions. In particular, policies to improve international markets, to assist in cropland adjustments, to manage grain reserves and to assist displaced farm families should be considered. Hopefully there will be recognition of policy and program needs in the debate of a new "farm bill" in 1990.

Income Assistance That Does Not Distort Trade or Hamper Adjustment. Because of the importance of current income supplement programs to wheat and feed grain producers and to farm-dependent counties in the Plains, alternative income supplements are of interest.

Changes in the way income subsidies are paid and in eligibility for payments have been proposed that would allow or encourage adjustments that would make future reductions more palatable. "Decoupling" has been mentioned as a feature of future agricultural policy (Trock, 1989). Proposals for phasing out direct (deficiency) payments include "producer entitlement guarantees" and "exit annuities" (Blandford, 1988; Tiegen, 1988). These have the potential for easing the impacts of change from existing to less costly and less distorting agricultural programs. These policy tools could be self liquidating, would not affect production or land values, and would not reduce resource mobility or retard structural change, as have past programs which have focused on adjustment of the land resource. Targeting future income supplements to those with need of assistance would certainly make them more efficient.

Policies to Deal With Variability. A number of existing policy tools provide important help in dealing with the problems of variability discussed earlier. These programs should not be forgotten as we move ahead with new or revised agricultural policy.

The Farmer Owned Reserve for wheat and feed grains is very important for smoothing between-year and multi-year variations and for absorption of shocks to the marketing system. Determining the appropriate level of reserve stocks to meet export market commitments is a major policy issue highlighted by the accent droughts and the continuing desire of the United States to be a reliable supplier of food (Tweeten, 1988a). A simple subsidy payment for grain storage has been suggested as an efficient way to increase reserve stocks. Increased involvement in export markets increases the need for such a program.

The Conservation Reserve Program created by the '85 Food Security Act is also very important to Plains farmers who are making land use adjustments. Fifty percent of the cropland currently enrolled in the program is in the Great Plains states (ASCS-USDA, 1988). Continuation of this program will be important to conservative use of land and to land use adjustments that appear likely in the future. There will surely be a need to give more attention to the program and to use of land in the program as the rental contracts expire.

Other policy tools to manage risks and to allow resource mobility will be important. The "safety net" feature of commodity loan programs will be significant to producers' efforts to cope with price variability; and the crop insurance program will be important to management of risks associated with production. Credit programs of the Farmers Home Administration and the Farm Credit System increase capital availability and reduce some of the adjustment burdens of Plains' farmers.

Human Resource and Community Development Programs. Finally, in the Plains where so many counties are farm dependent, non-farm policies that focus on the adjustment problems of people and communities should receive increased attention. The adjustments within agriculture that have been suggested as probable will spill over into communities, affecting business enterprises, employment and incomes. It seems clear that programs to assist displaced farmers and programs to broaden the economic base of rural communities are particularly important in the region.

A Concluding Footnote

It is interesting to look back over the past 20 years, to examine the analyses of Plains agriculture of the late '60s and early '70s and to note the questions being asked. In some respects, little has changed. The late '60s saw concern for excess capacity, production adjustments and the probable impacts of reduced government support of agriculture. In other ways problems have increased. U.S. farmers are more dependent on export markets; they are more affected by inflation, exchange rates, monetary and fiscal policy of the government; and they are faced with increased product price instability. Farmers may also have become more dependent on government payments.

It is not clear that the current farm structure in the Plains is more resilient or more capable of adjustments to changing markets, technology and government programs than was the structure of the late '60s. Some people argue that the gradual loss of a family farm structure has reduced the capacity of the agricultural sector to adjust. The evidence from research is inconclusive.

It is perhaps more illuminating to consider events of the intervening years, the decades of the '70s and '80s. In these 20 years we have seen both surpluses and scarcities of farm products, peaks and valleys in farm incomes, financial booms and busts, and sharp swings in policy sentiments. Finding ways to adjust, or even to keep up with these kinds of changes, remain the greatest challenge to Great Plains agriculture.

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