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Perspectives on Farm Policy Reform

Julian M. Alston and Daniel A. Sumner

This article begins with a review of what has happened to U.S. domestic farm policies and related agricultural trade policies over the past 10 years. We conclude this review with a brief overview of the policies as they stand today. Then we consider potential outcomes in the 2007 Farm Bill, and their implications for U.S. agriculture and, in particular, for agriculture in the Western states. Finally, we contemplate the longer-term possibilities for meaningful, enduring reform of U.S. farm program policies.

Key words: 2007 Farm Bill, U.S. farm policy, WTO

Introduction

“Reform? Reform? Are things not bad enough already?”

— Attributed to Justice John Astbury, 1926, among others

Ten years ago U.S. farm policy had just undergone major adjustments, and appeared to be on a long-term path toward much less government involvement in commodity markets and reduced transfers to agriculture. In the late 1980s and early 1990s, agriculture was, for the first time, a central part of GATT negotiations. The United States was a strong advocate for lower trade barriers and reduced agricultural subsidies that distort trade. In 1994, the Uruguay Round GATT Agreement was signed and the new World Trade Organization (WTO) was formed. Consistent with the thrust of the U.S. position, the Uruguay Round Agreement on Agriculture (URAA) entailed substantial commitments toward freer trade in agricultural products. The U.S. domestic commodity policy at the time was thought to be fully consistent with the URAA, and the United States was on a path to further changes that would facilitate additional global liberalization. In the European Union the 1992 “McSharry reforms” of the Common Agricultural Policy allowed the EU to accept the URAA, and subsequent changes of domestic subsidy programs reduced the EU resistance to multilateral commitments.

The 1996 Farm Bill (the Federal Agriculture Improvement and Reform, or FAIR, Act) removed or reformed several of the most production-distorting programs, continuing a shift initiated in the 1985 Farm Bill (the Food Security Act of 1985) and reinforced in the

Julian M. Alston is a professor in the Department of Agricultural and Resource Economics at the University of California, Davis, and a member of the Giannini Foundation of Agricultural Economics. Daniel A. Sumner is the Frank H. Buck, Jr., Chair Professor in the Department of Agricultural and Resource Economics at the University of California, Davis, Director of the University of California Agricultural Issues Center, and a member of the Giannini Foundation of Agricultural Economics. A preliminary version of this article was presented as the Keynote Guest Address at the Western Agricultural Economics Association annual meeting, Anchorage, Alaska, June 28–30, 2006. The authors gratefully acknowledge helpful comments and suggestions from participants at that conference as well as two anonymous referees and the editor.

Review coordinated by David K. Lambert.

1990 Farm Bill (the Food, Agriculture, Conservation, and Trade, or FACT, Act). When the 1996 FAIR Act became law, on the heels of the new GATT accord, many agricultural economists felt the stage had been set for substantial and enduring changes, such that the era of large-scale and highly distortionary subsidies to U.S. agriculture was coming to an end.

Looking forward from 1996, few would have anticipated the turns taken by U.S. farm commodity policy during the succeeding 10 years, reflecting both ad hoc legislation under the FAIR Act and policy reversals in the 2002 Farm Bill [the Farm Security and Rural Investment (FSRI) Act]. In international as well as domestic policy, the position and image of the United States has changed. While the Doha Round of WTO negotiations was underway, the U.S. Congress crafted the FSRI Act of 2002, which created and reinforces the very agricultural policies that were most criticized in bilateral and multilateral trade negotiations. U.S. farm policies have been found out of compliance with GATT rulings and the United States has failed, so far, to implement the changes mandated by WTO rules (Schnepf and Womach, 2006). The image of the U.S. government as a proponent of trade policy reform and a leader for more open markets has been tarnished significantly as a result.¹

With this background, in the remainder of this paper we try to make sense of U.S. agricultural policy, its likely prospects, and implications. We take the view that, for the most part, the purpose of farm programs is redistributive and that the main consequences are intended. Specifically, we do not see commodity programs as policies mainly designed to correct market failures, i.e., policies which only inadvertently shift billions of dollars from taxpayers and consumers to farmers and landowners and distort agricultural resource use, production, and trade patterns. Nor do we see it as a matter of legislative errors or "loopholes" that the distribution of benefits is relatively concentrated among those who control most of the resources used to produce a handful of commodities. Nevertheless, there is a role (a) for analysis and improvement in the institutions whereby the political process is better informed about the consequences of existing policies, and (b) for the development of ideas and information about alternative policies and institutions.

We first review the recent path of U.S. farm policies, and ask why these changes have occurred. We conclude this review with a brief overview of the policies as they stand today. Then we consider some potential outcomes of the 2007 Farm Bill and their implications for U.S. agriculture and, in particular, for agriculture in the Western states. In this paper we take the liberty of speculating about some of the political economy aspects of farm policy in the United States. This is always risky, and we do not claim to have any insider knowledge about the working of the political marketplace. We draw only on basic economic reasoning and our experience of observing agricultural policy and the forces that seem to drive the policy process over the relevant time span of a few decades.²

In the discussion of past, present, and future U.S. farm policies, we focus on the farm commodity programs and policies at the core of the Farm Bill and WTO agreements and

¹ In March 2005, the WTO Appellate Body ruled in a dispute brought by Brazil that the U.S. support for upland cotton contravened WTO rules. In September 2006, Brazil initiated a further complaint that the United States had failed to implement policy changes to meet its obligations under the original ruling.

² Implicit in our approach to these issues is a view, or informal model, of the political economy of U.S. agricultural policy formation, consistent with the mainstream of the published work in this area as summarized by de Gorter and Swinnen (2002), for instance.

negotiations pertaining to agriculture. We explicitly leave out other important elements of the Farm Bill, including food and nutrition policies, which have accounted for the greatest share of expenditures in recent years; crop insurance and disaster assistance, which is a fascinating and important story (for instance, see Glauber, 2004); environmental and conservation policies, except as these connect to commodity subsidies; and agricultural R&D. Among these omitted topics, several elements have important implications for commodity markets (such as the Conservation Reserve Program) and thus for the consequences of commodity programs, and we touch on these aspects. Similarly, we set aside several important elements of the current and prospective WTO agreements, some of which may have commodity market implications—such as intellectual property provisions, sanitary and phytosanitary rules, agreements on food aid, and state trading enterprises.

Some Recent History of U.S. Farm Commodity Policies

Useful insight into the present policy and what can be expected in the near future can be gleaned from reflecting on the recent past, including the past two Farm Bills, discussions of a new Farm Bill, the current WTO agreement, the path of the Doha Round negotiations, and related policy changes such as bilateral and multilateral trade agreements. We discuss key policy events, in loose chronological order, and conclude this section with a brief summary of farm program expenditures and the more comprehensive Producer Support Estimates (PSEs).

The 1994 Uruguay Round Agreement on Agriculture

The URAA entailed a substantial commitment among WTO members to discipline trade-distorting agricultural policies such that agricultural commodity markets could become increasingly driven by market forces rather than government intervention. The implementation period for these commitments began in 1995 and was set to conclude in 2000 for developed countries and 2004 for developing countries. The Agreement also entailed a provision that member countries resume negotiations on agriculture by December 31, 1999, one year before the end of the implementation period for developed countries.

The three main pillars of the Agreement dealt with increases in market access, reductions in overall domestic support, and reductions in export support. The provisions related to market access specified changes in barriers to agricultural imports to make them less restrictive and to allow more trade to flow. Minimum market access and a schedule for gradual expansion was set for each commodity; import quotas and other nontariff barriers were converted to tariff rate quotas, with the rates of bound tariffs scheduled to decline over time.

Domestic support policies were differentiated into categories according to their supposed effects on production and trade. “Green box” policies—domestic farm programs that meet certain criteria for causing at most minimal trade distortions—were exempted from any limits. “Blue box” policies—domestic farm programs that distort production incentives but are linked with supply controls—were also exempted from any reduction commitments. “Amber box” policies—policies that directly subsidize production and influence the decision to produce—were limited by the agreements. Amber box support

was measured as budget costs or as a price support relative to an international base price. If amber box support for a commodity (or for all of agriculture, in the case of support that was not commodity specific) exceeded a *de minimus* share of market value, then that support was included in the Aggregate Measure of Support (AMS). Each WTO member was assigned an historically based AMS limit, which was to be reduced gradually over time. The Agreement disciplined export subsidies by placing limits on both the value and volume of subsidized exports, with these limits scheduled to decline through the implementation period. Table 1 summarizes the quantitative provisions.

Farm Bill Policies

The United States government played a significant leadership role in the development of the URAA. With high commodity prices in the middle of the 1990s and with export subsidies already much reduced, there was little concern over U.S. compliance with the WTO in the debate over the 1996 Farm Bill. Nonetheless, the 1996 Farm Bill reflected the U.S. commitment to reduced and less-intrusive farm programs that were consistent with the new WTO Agreement. The period of implementation of the URAA coincided with the period of implementation of the 1996 Farm Bill. At the beginning of that period, a significant reduction of the role of the U.S. government in agricultural commodity markets seemed reasonably likely. However, the experience over the full implementation period exposes the difficulty of achieving meaningful and enduring reform of agricultural policies.

The 1996 Farm Bill

The 1996 FAIR Act replaced a number of complex subsidy program features that affected acreage, production, and marketing of major field crops directly, with payments that were less linked to specific planting behavior by farmers. The FAIR Act eliminated both authority for annual land set-asides and program crop price supports that would lead to government stock acquisition. It also replaced deficiency payments, which were tied directly to the production and prices of specific crops, with new "production flexibility contract payments" calibrated to provide the same average transfer as the deficiency payments had, but which allow much more planting flexibility and are not tied to commodity prices. However, the FAIR Act continued marketing loan payments that are tied to production of specific crops and are conditional on low prices for those crops.

Because the Act passed during a period of high prices and forecasts for high prices, farmers expected to receive more money from the new programs and to have fewer restrictions on their planting behavior than would have occurred under previous law. With those expectations, major farm groups supported the program. In 1998, however, when crop prices declined, Congress demonstrated that the fixed payments of 1996 had been a one-sided bargain (Gardner, 1999). When prices were high, farmers received the full fixed payment, but when prices were low, an ad hoc program was introduced to raise the payment by 50% (in 1998) and then by 100% (in 1999 through 2001). These ad hoc payments were distributed on the same basis as the contract payments, but were clearly linked to low farm prices for program crops. In addition, with low crop prices, the fully coupled marketing loan payments became much larger than had been anticipated.

Table 1. Main Provisions of the Uruguay Round Agreement on Agriculture

Negotiated Change	Implementation Period	
	Developed Countries (1995–2000)	Developing Countries (1995–2004)
	— (%) —	
Market Access:		
▶ Average tariff cuts for all agricultural products	–36	–24
▶ Minimum tariff cuts per tariff line	–15	–10
Aggregate Support:		
▶ Total cuts in Aggregate Measure of Support	–20	–13
Export Subsidies:		
▶ Value cut by product	–36	–24
▶ Volume cut by product	–21	–14

Source: USDA/Economic Research Service, "The Road Ahead ..." (2006).

Note: Least developed countries were required to bind their tariffs but are exempt from reduction commitments.

The 2002 Farm Bill

In 2002, the FSRI Act converted the ad hoc payments to countercyclical payments tied to specific crop prices. It continued the production flexibility contract payments, now simply called "direct payments," and extended both this program and the countercyclical payment program to additional crops including soybeans. It also allowed farmers to update—to the 1999 through 2001 period—the historical acreage and (for the countercyclical payment program) yields used as a basis for payments. Farmers were allowed to update yields only if they updated acreage. Overall, the expected government costs of crop payments were only moderately higher than in the previous years that included ad hoc legislation, but the form of payments was clearly a reversal of the FAIR Act of 1996, and even more so a reversal of the trend toward ever-less-restrictive programs.

Compared with the FAIR Act programs, the new programs were more likely to stimulate production of program crops for two reasons. First, the countercyclical payments were tied explicitly to the market price of the base crop and, while producers were allowed other uses for the base acreage, most base acreage continued to be planted to the base crop (see Young et al., 2005). Second, by allowing farmers to update acreage and yields, the program rewarded farmers who continued to plant the program crop on base acreage and penalized those who had exploited flexibility provisions of the 1996 Act (Sumner, 2003). This signal was not lost on growers considering what to plant in subsequent years.

Given this background, an important question is whether it is politically viable to employ the concept imbedded in the 1996 FAIR Act, that the linkage between payments and production could be reduced and perhaps removed while annual payments continued. Two facts suggest that this approach remains a viable strategy. First, the FAIR Act faced fortunate timing of price swings to be enacted in the first place, but bad luck in the depth and timing of the subsequent price collapse at a time when federal budget pressure receded. Second, the FSRI Act of 2002 continued several of the reform concepts in the FAIR Act, some of which go back to the 1985 Act. Thus, it is not true that the FAIR Act was tossed out in 2002, and perhaps the partial reversal would not have occurred

without the special circumstances in place from 1998 to 2001 (Sumner, 2003). Nevertheless, the FSRI Act did involve some substantial reversals of important elements of the changes in policy implemented over the preceding 20 years.

Dairy and Sugar

The main subsidized grain, cotton, and oilseed crops are significant export industries and comprise about 35% of U.S. agriculture. The U.S. dairy industry, which produces about 10% of U.S. farm revenue, is different. It exports relatively little and is protected from substantial imports with tariff rate quotas (TRQs). Even more than with dairy, the main source of support for the sugar industry has long been the trade barrier which, since the URAA, has been in the form of a TRQ; the U.S. support price has been frozen since the 1996 Act and is well above the typical range of the world price.

U.S. dairy product prices are typically above the prices at which those products trade in global markets; recently this applies particularly to products containing milk fat. In 1996, the FAIR Act scheduled a consolidation of dairy marketing orders from about 33 to 11 and authorized a "compact" or special cartel for New England. The price support was further phased down to \$9.90 from \$10.35 per hundredweight. The provision to eliminate the price support in 1999 was delayed until 2002. In subsequent ad hoc legislation, "market loss assistance payments" were authorized for 1999 through 2001. In 2002, domestic dairy program changes increased the role of direct payments and reversed plans to remove the price support program. As a result of these changes, the U.S. dairy program has additional production incentives and has become less compatible with trade liberalization. The price support itself, however, stands at about 30% below the value in 1981 in nominal terms and is seldom binding. Government outlays and stock accumulations under the program are quite limited.

Critical Trade Disputes and Potential Disputes

The changes in U.S. farm policies discussed above were devised and implemented in the context of global agricultural commodity markets, and thus subject to limitations implied by the URAA. As noted above, the URAA specified certain rules for trade policy, and a set of changes to be implemented from 1995 through 2000 (and 2004 for developing countries). Even as WTO members have complied, for the most part, with the WTO agreements, agricultural liberalization has proceeded only slowly. Many members still have high trade barriers for many commodities, and explicit export subsidies remain important in several cases, especially for livestock products. Furthermore, trade-distorting domestic support has not declined, and in some cases has risen as a result of lower global market prices. Most of these outcomes are within the rules, but several important U.S. programs have been found out of compliance with the WTO Agreement.

When WTO member countries perceive that other countries are in breach of the WTO agreement, they can seek a ruling by the WTO and, if successful, seek redress. There have been several high-profile cases involving farm commodities since 1994. In the 1990s, in a case that went through several stages, the United States and New Zealand successfully challenged the "producer-financed" export subsidy regime of Canada. In 2005, Brazil and others won their challenge against an export subsidy feature of the EU

sugar program. Canada and the EU have removed the specific offending programs, but in both cases the underlying domestic subsidy regimes and import barriers remain in place.

In a complex and wide-ranging case brought in 2002 and finally decided in 2005, Brazil won a major decision affecting several aspects of the U.S. farm program for upland cotton (Schnepf and Womach, 2006). The WTO Panel ruled and the Appellate Body agreed that the U.S. Step 2 subsidies for buyers of U.S. cotton combined GATT-illegal export subsidies and illegal domestic content subsidies. In addition, U.S. export credit guarantees, applied to cotton and several other commodities, were ruled illegal export subsidies. Furthermore, in a ruling with far-reaching implications, the U.S. price-contingent cotton subsidies, the marketing loan program, and the countercyclical payment program were found to have depressed world prices of cotton and caused "serious prejudice" to the interests of Brazilian cotton producers. This price-suppression ruling was specific to cotton, but has implications for several commodity programs similar to cotton (Sumner, 2005a). In particular, the programs for wheat, feed grains, rice, and soybeans all may be vulnerable to similar "serious prejudice" challenges under the appropriate market conditions (Schnepf and Womach, 2006).

The cotton case is also important for the basis of a procedural ruling made in a preliminary stage of the case. The United States claimed that the so-called "peace clause" of the URAA protected the U.S. cotton program from challenge (until 2004) because support in the period being challenged did not exceed support in the 1992 reference period. In evaluating and ultimately rejecting the U.S. claim, the Panel (and the Appellate Body) ruled that the measurement of support for cotton must include direct payments and crop insurance subsidies as well as countercyclical payments and marketing loan benefits. By including direct payments in the calculation of support for cotton, the WTO Panel and Appellate Body raised concerns that this program could not be considered in the "green box" of minimally distorting support, and thus would need to be included in the AMS for WTO reporting purposes. This ruling is important because, at least under some calculations, if direct payments are to be included in the "amber box," the United States may have exceeded its AMS limits in several recent years.

Additional challenges to U.S. farm programs have been widely discussed in international forums. For example, Uruguay initiated consultations with the United States over rice subsidies, and interests in Argentina and Canada have investigated bringing WTO cases against the U.S. corn subsidy. These potential challenges are seen as an incentive for the United States to use the next Farm Bill to revise farm programs to comply with international obligations.

The Doha Round of WTO Negotiations

The Doha Round of WTO negotiations, launched in 2001, made considerable progress in framing issues and narrowing differences in positions on agriculture. In these negotiations, large developing countries, especially India and Brazil, emerged as major powers alongside the United States and the EU, and have generally pushed for lower agricultural trade barriers and subsidies. A framework agreement calls for first, elimination of all export subsidies, which would affect mainly the EU; second, substantial and binding reductions in trade-distorting domestic subsidies, which would affect the United States and Europe and some other members such as Japan and Korea; and third, substantial

reductions in tariffs and expansion in TRQ quantities for products where these apply. The impediment to a final agreement has been the balance between effective market opening, as sought by the United States, and reductions in domestic subsidies as sought by Europe and developing countries such as Brazil.

In July 2006, however, the WTO announced that the members had failed to reach agreement on reforms to farm subsidies and lowering import protection. Consequently, the Doha WTO negotiations were suspended. The negotiating authority of the U.S. administration will expire in July 2007 and, unless there is a remarkable turnaround, negotiations will be on hold until the U.S. Congress renews negotiating authority. Therefore, the new Farm Bill will likely be written under the current URAA and will be settled before WTO negotiations resume.

In parallel with the unilateral reshaping of domestic farm program policies, and the overarching multilateral processes of policy development and implementation through the WTO, the United States has been engaged in a series of bilateral and regional trade negotiations that imply changes in border protection, but not in domestic policies. The recent agreements with Australia and the Central American and Caribbean nations, and the ongoing negotiations with Korea, may have important implications for U.S. exports and some imports of agricultural products, but they have no direct implications for farm subsidy policy and only minor indirect implications for U.S. subsidies.

Measures of U.S. Farm Program Policies, 1996–2006

The simplest and most widely used measure of farm commodity policy is expenditures. Table 2 shows total annual expenditures under the programs from fiscal year (FY) 1996 to projections for FY2006, which ends September 30, 2006. Expenditures in FY1996 were mainly attributable to programs authorized in the 1990 Farm Bill, with expenditures in FY1997 through 2001 attributable to the FAIR Act and annual ad hoc legislation that began in 1998. Expenditures in 2002 through projected expenditures in 2006 are attributable to the FSRI Act. However, given the nature of the marketing loan program and the countercyclical program, expenditures vary from year to year largely in response to prices of grains, oilseeds, and cotton.

Table 3 provides data from the Organization for Economic Cooperation and Development (OECD) on Producer Support Estimates (PSEs), measures that include non-commodity-specific support and support provided by border measures and other price support tools in addition to subsidy expenditures. Table 3 facilitates comparisons across countries, commodities, and years. As observed from the table, the United States provides little support for meat and poultry products that are heavily supported in some OECD member countries. The table also documents a rise of support in the United States from 1995 to 2004. Although much of this increase resulted from lower commodity prices in 2004, the changes in the Farm Bill programs also account for some of the increases in PSEs, especially for oilseeds.

Even after the implementation of the 2002 Farm Bill and the various reforms of the Common Agricultural Policy in Europe, the EU still provides more support for agriculture than the United States does. EU subsidies are higher for all commodities (except dairy in 2004), with large differences for beef, pig meat, poultry, oilseeds, corn, and other grains. EU subsidies are high as well for many fruits, vegetables, and tree nuts—commodities of importance in Western states and only minimally supported in the United

Table 2. Total U.S. Commodity Credit Corporation Net Outlays, Fiscal Years 1996–2006

Year	Total Expenditure (\$ millions)		Year	Total Expenditure (\$ millions)
1996	4,646		2002	15,680
1997	7,256		2003	17,425
1998	10,143		2004	10,575
1999	19,223		2005	20,187
2000	32,265		2006 ^a	21,257
2001	22,105			

Sources: USDA/Farm Service Agency (2006); USDA/Economic Research Service (for 1996 and 1997 figures).

^a The 2006 data are estimates.

Table 3. Agricultural PSEs, by Commodity, 1995 and 2004

Commodity	1995			2004		
	OECD	European Union	United States	OECD	European Union	United States
Wheat	28	44	15	33	39	32
Maize	15	46	6	31	43	27
Other Grains	42	59	8	43	48	39
Rice	82	48	26	75	39	18
Oilseeds	20	52	5	27	35	24
Sugar (refined equivalent)	47	58	41	58	65	56
Milk	42	46	26	36	30	39
Beef and Veal	32	53	3	34	68	4
Pig Meat	19	14	3	21	24	4
Poultry	22	49	4	20	46	4
Eggs	17	9	11	9	2	4
All Included Commodities ^a	31	36	10	30	33	18

Source: Organization for Economic Cooperation and Development (OECD), PSE/CSE database 2005.

Notes: PSE is the percentage of producers' gross income coming from government intervention. Producer "subsidy equivalent" was initially defined as "the monetary value that would be required to compensate farmers for the loss of income resulting from the removal of a given policy measure." As of 2004, the OECD countries have agreed to replace "subsidy equivalent" by "support estimate." PSE is an indicator of the annual monetary value of gross transfers from consumers and taxpayers to support agricultural producers (measured at farm gate level) arising from policy measures which support agriculture (regardless of their nature), objectives, or impacts on farm production or income.

^aThe OECD data do not include cotton, which is highly supported in both the EU and the United States. They also exclude fruit, vegetables, and tree nuts, and other horticultural crops, none of which have significant support in the United States, but which tend to be highly supported in the EU.

States. Furthermore, while the OECD does not report PSEs for cotton, other analyses and calculations based on recent data suggest a U.S. PSE for cotton of about 50% in 2004, with the figure in the EU significantly higher (Sumner and Brunke, 2003; Sumner, 2005b).

Current Status and Immediate Policy Prospects

Debate and positioning for the Farm Bill expected in 2007 are well underway. Many farm organizations and other groups have begun to stake out positions, with a number of commodity organizations, including the American Farm Bureau Federation, suggesting that the FSRI Act of 2002 should simply be extended for as many years as possible (American Farm Bureau Federation, 2006). A number of forces have been driving the nature of the Farm Bill debate, but for the past seven decades the major farm policy decisions seem to have had the support of the mainstream farm commodity groups, and the forces for preserving the status quo have generally been remarkably successful.

Furthermore, in 1996, Farm Bill changes were actually supported by mainstream commodity groups who expected high market prices to mean that the price-based subsidies would be of little value in the short run. With somewhat more open international markets, these groups also saw less value to land set-asides and government stock activities. Thus, to these groups it seemed a good tradeoff, to exchange guaranteed payments for the previous programs of price-dependent deficiency payments that required land idling. It became an even better tradeoff when, as soon as prices declined, Congress initiated ad hoc payments to offset losses. Today, both the direct payments that arrive even when prices are low, and the countercyclical payments, which do not require land to be idled, have been institutionalized by the 2002 Act. Consequently, mainstream farm commodity groups are strong supporters of maintaining subsidy programs.

Several stimuli for market-oriented changes in farm subsidy programs may be identified and discussed briefly in turn (Thompson, 2006):

- First, and perhaps most important, the U.S. budget deficit is projected to exceed \$300 billion in FY2006 and to remain high, in the range of \$270 billion in 2007 (Congressional Budget Office, 2006). Over the past two decades, farm subsidies have declined when budget deficit pressures were higher, and the opposite occurred in 2002 when some were anticipating reduced budget pressure. Budget deficit pressure was credited for moderating the inclusion of massive farm disaster payments in emergency legislation in June 2006 (Wolf, 2006). But budget pressures need to be put in perspective. With farm subsidy outlays of perhaps \$20 billion per year, farm programs clearly will not be a major contributor to budget reduction. Unless there is a non-budget case for deeper reforms, cuts in farm programs would be a small part of a broad-based cut in outlays, perhaps in the range of 5% to 10%. So, while budget pressures may moderate outlays and reduce some market effects of subsidies, they are unlikely to cause program elimination or other major policy shifts.
- Second, environmental groups and their allies have long argued for farm program changes (American Farmland Trust, 2006). These groups were successful over the past few decades in attaching environmental provisions to commodity programs in previous

farm legislation. The current thrust is to replace commodity subsidies with support for conservation and environmental services that may be provided on-farm. The Conservation Security Program created by the 2002 Act was a small and awkward step in that direction, tying some payments to approved practices on farms. Those with a particular interest in the "Conservation" title of the Farm Bill have now focused aggressively on using funds, which might otherwise have gone for commodity programs, for subsidies attached to practices that supporters hope will provide environmental benefits. These forces have the support of the mainstream media which typically have opposed farm subsidies.

- Third, urban newspapers and those who want to shift farm subsidies to other purposes have long pointed out that most farm payments are associated with relatively large farms, and a small share of total farms receives the bulk of farm payments. Since most of the payments are roughly proportional to current or historical production, payment programs that support commodities must distribute most payments to those who produce a significant amount of commodity output—i.e., the distribution of payments is inherent in the program's structure, and not a function of loopholes or legislative accidents. Farm subsidy payments never were, and cannot be, effective welfare programs for the poor (Sumner, 1991). It is no secret, and no mistake, that most farm program payments go to a comparatively small number of relatively wealthy farm owners. Nonetheless, pointing out this truism is a "perennial" of the urban press, usually coming to full blossom when the Farm Bill season approaches. The argument is now even easier to make because detailed data from the Environmental Working Group (www.ewg.org) are well known and available in an easy-to-use format.
- Fourth, growers of nonsupported crops are more active in the current Farm Bill debate than ever before. Many observers have commented on the distribution of farm program payments to a handful of field crops plus dairy farmers. Growers of nonsupported crops have begun to argue for more support for research, marketing programs including nutrition education, protection from invasive species, and opening international markets. These groups have directly challenged spending such a high proportion of the agriculture budget on income transfers that do little to improve productivity or competitiveness. Growers of nonpayment crops have pointed to their lack of direct support as one rationale for restricting production of wild rice, fruits, vegetables, melons, and tree nuts on land receiving direct payments. As argued by these growers, allowing direct payment recipients to shift to the restricted crops would flood their markets and drive down prices because total acreages of the restricted crops tend to be small relative to acreage of program crops and because demand is inelastic. Moreover, they contend there was something inherently unfair about growers who were subsidized based on production of one crop being free to compete in production of another crop with growers who have never been eligible for subsidy.
- Fifth, WTO negotiations have highlighted how much other countries target U.S. domestic farm subsidies. In its proposals and in the negotiation process, the United States has emphasized that it sees gains in market access as a tradeoff for reducing and reforming U.S. commodity subsidies. A WTO deal with meaningful market access would likely have required substantial cuts in U.S. "trade-distorting" domestic support (Abbott, 2006). Hence, commodity interests and others who see benefits to U.S.

agriculture from greater international market access have successfully urged the inclusion of farm subsidy cuts in U.S. WTO proposals. However, the collapse of the Doha Round in mid-2006 eliminated this motive for farm subsidy changes in the United States and may strengthen the hand of those who argue that farm subsidies are needed because of subsidies and barriers in other countries or to keep a bargaining chip for the next set of negotiations.

- Sixth, the core existing WTO Agreement has implications for U.S. farm subsidies and is an active force for farm program reform. As discussed above, the results of the WTO dispute over upland cotton suggest that several U.S. farm programs may be vulnerable to WTO challenge (Schnepf and Womach, 2006; Sumner, 2005a). Two features of the cotton ruling have particular importance for Farm Bill commodity programs. First, subsidy programs are vulnerable to challenges on the grounds that they depress or suppress market prices, or they unfairly reduce the production in other countries and thereby harm the interests of commodity producers in other WTO member states. Other commodity program challenges will not necessarily follow the model of the cotton case, and we can imagine cases with focus on specific foreign markets rather than the whole-world market. Furthermore, in another case, with a different set of facts, challenges based on the price-depressing effects of crop insurance or direct payments could be successful. Second, the ruling that crop insurance, countercyclical payments, and direct payments all counted toward support for upland cotton, suggests the WTO Appellate Body has a broad view of what constitutes support. In the cotton case, the Panel and Appellate Body referenced the list of crops disallowed under the "direct payment" program, and this provision at a minimum is now likely to change. But U.S. programs are vulnerable for inclusion in the "amber box" and even in the commodity-specific AMS for other reasons as well.
- Seventh and finally, economists and those who use economic evidence have continued to point out the serious negative consequences of farm subsidy programs for resource allocation, among other concerns. As economists have shown, benefiting one commodity may harm others, benefits tend to accrue to owners of inelastic resources, and many of the most dynamic, innovative, and successful agricultural industries are found among those that are not encumbered by subsidy programs. On the other hand, these economic arguments are not new, and economists have not been notably effective in getting their views across in the United States despite having access to strong policy makers (Gardner, 1996).

Effects of Farm Subsidies on Agriculture in the West

As documented above, the main farm subsidies in the United States apply to a handful of major crops and dairy. Furthermore, we have discussed how producers of nonsubsidized commodities have begun to consider the indirect costs of the farm subsidy programs. In this section we explore the role of farm commodity programs in Western agriculture.³ Most farm

³ As with the rest of this paper, we are not including in this discussion programs such as the Conservation Security Program, which is applied to specific watersheds, or the Conservation Reserve Program, which is widely used in the West and is often used to idle cropland that has relatively low farm output value per acre—a common feature of parts of the arid Western plains. We also have omitted consideration of water subsidies, another major subject.

commodity programs are defined around commodities, not around region of production. Thus the distribution of subsidy in the West is determined largely by the distribution of commodity production, with two exceptions—dairy marketing orders and payment limits—which are discussed later. Production patterns show how agriculture in the West differs from agriculture in the rest of the United States.

Table 4 shows the distribution of cash receipts by commodity for the rest of the United States and for the West. Among crops, the West specializes in tree and vine crops, vegetables, melons, greenhouse and nursery crops, and hay; and it produces relatively little of the subsidized feed grains, and especially oilseeds. Perhaps surprisingly, compared with the rest of the United States, Western agriculture has a slightly smaller share for cattle and calves, but a much smaller share for poultry and hogs, all of which is little subsidized. Given rapid growth in recent years, the West now has a much larger share of agriculture devoted to dairy than does the rest of the United States.

Crop payment programs apply to only about 7.2% of Western agriculture compared with more than 25% of agriculture in the rest of the nation.⁴ This is a major difference. It means that relatively little of the approximately \$20 billion in crop subsidy payments each year goes to agriculture in the West, and this has three effects of note. First, agriculture in the West tends to be more diverse, more reliant on market incomes, and more adept at using market institutions to deal with market price fluctuations. Second, the unsubsidized portions of agriculture—whether in the West or elsewhere—are smaller as a result of subsidies afforded other portions of agriculture that compete with the unsubsidized portions for resources or for consumer expenditure. However, the effects on prices are ambiguous (unsubsidized portions have higher prices than they would in the absence of subsidies for crops competing on the supply side, but have lower prices than they would in the absence of subsidies for crops competing on the demand side). The story for hay is complex because hay competes on both the supply side and the demand side with subsidized crops.

Third, by dominating the agricultural budget and policy attention, program crop subsidies may actively hinder the interests of unsubsidized commodities and non-commodity-specific interests—again, whether they are located in the West or elsewhere. On the budget side, spending on crop subsidies uses budget dollars that might otherwise go for investments in public goods to improve agricultural productivity and enhance demand for farm products. Expenditures on research, protection from invasive species, nutrition information, and infrastructure investments may be crowded out by commodity programs. More generally, with federal attention focused on subsidy issues, there is simply less attention to issues likely to improve the economic and environmental sustainability of agriculture.

One major concern is that the protection of farm subsidies is a major pillar in the U.S. negotiating position and strategy in the WTO and bilateral free-trade talks. The U.S. reluctance to reduce subsidies more substantially is a major factor in WTO negotiations. The U.S. proposes complex schemes of seeming subsidy reductions that appear to allow most current subsidies to continue to be delivered to current beneficiaries. Certainly, this is the perception of negotiating partners who simply do not trust the United States to really cut subsidies. The perception is further reinforced by the seeming reluctance of the United States to comply fully and expeditiously with its obligations under the upland cotton decision. Hence, other countries are less willing to open their markets or lower their subsidies, which is to the detriment of U.S. export-oriented industries such as tree nuts, tree fruit, and processing tomatoes.

⁴ As an aside, we note that crops in the West also have lower participation rates for subsidized crop insurance than those in the rest of the United States.

Table 4. Major Agricultural Commodities in the West and the Rest of the United States, 2004

Commodity	Non-Western United States		Western United States ^a	
	Cash Receipts (\$ billions)	Share (%)	Cash Receipts (\$ billions)	Share (%)
Crops:				
Fruits, Nuts, and Vegetables	9.8	5.5	22.9	37.0
Greenhouse	10.4	5.8	5.3	8.6
Hay	2.3	1.3	2.1	3.4
Wheat	5.3	2.9	2.1	3.4
Cotton	4.4	2.5	1.0	1.6
Other Program Commodities ^b	42.4	23.7	1.4	2.2
Livestock:				
Cattle and Calves	35.9	20.0	11.4	18.4
Dairy	17.1	9.6	10.2	16.5
Poultry	27.7	15.4	1.8	3.0
Other	24.0	13.4	3.6	5.9
Total	179.3	100.0	61.9	100.0

Source: USDA/Economic Research Service, "U.S. and State Farm Income Data Farm Cash Receipts, 1924–2004."

^a The Western United States consist of Washington, Oregon, California, Arizona, Nevada, New Mexico, Utah, Colorado, Idaho, Montana, and Wyoming.

^b Other program commodities include corn, barley, oats, sorghum, rice, soybeans, other oil crops, honey, wool, and mohair.

In assessing the effects of subsidy programs on Western agriculture, we should also note the role of payment limits. Farms in the West tend to be larger than those in the Eastern states, and therefore payment limits are more likely to be binding in the West. In some cases large farms have tended to shift from subsidized crops to nonsubsidized crops, such as producing pima cotton rather than upland cotton. In other cases, as with the Milk Income Loss Contract (MILC) payment program, farms in the West simply received much lower payments than farms in the East. Finally, we note that dairy is more important in the West, but, in addition to lower benefits from the MILC program, the dairy industry in the West is less likely to participate in Federal Milk Marketing Orders. The main subsidy for dairy in the West derives from the trade barriers that keep the price of many dairy products high relative to world prices.

Facilitating Policy Reform: Lessons from Australia and New Zealand

In this section we begin with a catalogue of some key elements of policy reforms in Australia and New Zealand, two countries that have very substantially dismantled their farm protection and subsidies over the past 30 years. Then we consider the potential applicability of four of those key elements in the United States: an economy-wide approach, transparency institutions, adjustment assistance, and compensation mechanisms. We conclude with some comments about the roles of economists in the design and implementation of those elements.

A number of specific factors, individually or collectively, contributed to the virtual elimination of agricultural subsidies in Australia or New Zealand.⁵ Three key ingredients were operative to some extent in both countries. First, agricultural policy reform in both Australia and New Zealand was undertaken systematically, in conjunction with and as an element of more general policy change, taking an economy-wide perspective. Second, policy review and reform was conducted in an open, publicly visible way—in Australia, through a specific transparency institution (what was originally the Industries Assistance Commission, or IAC, and is now the Productivity Commission). An economy-wide perspective on the implications of policy change, combined with a systematic economy-wide (rather than piecemeal and ad hoc, industry-by-industry) approach to policy, was important for educating the populace and enlisting the willing cooperation of (or at least mitigating the opposition from) significant segments of the agricultural industry in both countries. Third, having accepted the necessity of policy change and the implied resource adjustment, governments in both Australia and New Zealand introduced policies designed to facilitate adjustment rather than shelter agriculture from market forces and implicitly impede adjustment. Fourth, in at least some cases, individuals were explicitly compensated for their losses, as an element of the reform package, to make it politically feasible.

Economy-wide Approach

Change in agricultural policies in Australia and New Zealand was facilitated by the fact that the policy change processes were not singling out agriculture, or individual agricultural industries. Rather, they were deliberate, economy-wide microeconomic reform processes, taking an economy-wide perspective on the implications of industry-specific policy change. Partly as a result of this context, a greater awareness was developed of inter-industry connections and how distortions in one part of the economy had consequences for other parts, which in turn had implications for positions taken by interest groups. Agricultural interests became divided because their interests differed, and this division helped make change possible.

In the U.S. context, agricultural economics arguments and policy debates typically have not highlighted the fact that within U.S. agriculture there are many losers as well as gainers from U.S. farm commodity programs, particularly comparing producers of nonprogram crops and program crops. The intra-sectoral distributional consequences are tricky to resolve, given the complex nature of agriculture and the commodity programs themselves (for instance, many of the programs directly affect commodities that are intermediate products within agriculture, like feed grains, or those having strong complementarities in production with others, like feed grains and oilseeds). A useful role of economists can be to clarify this complex distributional story. Awareness of these issues, and demand for information on distributional aspects, is growing—especially from producers of unsubsidized nonprogram commodities who are arguing for a redirection of farm program support, as discussed earlier. What may be most lacking is an independent, credible source, with enough resources to be able to provide the kinds of information that would be most useful, and with an interest in doing so.

⁵ Details of New Zealand's agricultural policy reform and its context are discussed by Johnson, Schroder, and Taylor (1989) and Sandrey and Reynolds (1990), among others. Edwards (1980, 2003) examines relevant aspects of agricultural policy change in Australia. The discussion in this section is based in part on sources like these, but also on a much wider range of formal evidence from published work, informal sources, and personal experience.

Transparency Institutions

The United States has various counterparts to some roles of Australia's IAC, although none is quite the same—e.g., the Council of Economic Advisers, the U.S. International Trade Commission (ITC), and the General Accounting Office (GAO). The USITC, for instance, conducts investigations and prepares “transparency reports” at the request of Congress and the President, but these have not achieved the status required for them to have major effects on public policy. Other sources of information about farm program consequences provide some services related to transparency, but they may lack credibility because they are seen to have a particular policy agenda (for example, the Environmental Working Group or the American Enterprise Institute, or other think tanks) or to lack the relevant in-depth knowledge and expertise, or because they are constrained by their political-institutional environment (e.g., the OECD or USDA Economic Research Service).

The WTO dispute-settlement process plays some of the relevant roles, but it is constrained by its own institutional structure to focus on the legal issues defined by the Agreement, rather than the economic questions that may be more relevant for other settings, and only deals with those programs brought before it. All of these institutions notwithstanding, there is not really a U.S. counterpart to Australia's IAC, which would have the capacity to systematically review farm commodity programs and other, especially border, policies and recommend directions for change and processes of change.

It seems reasonable to suppose that economically rational agricultural policy would be facilitated if the United States had a transparency institution that played a role similar to that of the IAC in Australia—at least as far as the provision of analysis of the consequences of policies. However, one view of the IAC is, rather than causing change, it was simply a rational institutional mechanism for bringing about change—given that the decision to reduce industrial protection had been made. In contrast, the fact that the United States does not have an institution of this type might simply indicate that the United States is not ready to make changes of this type, and so there is no point in prescribing transparency institutions to governments who do not wish to make their policies transparent as a step toward eliminating them.⁶

Adjustment Assistance and Buyouts

The same thing may be said about adjustment assistance. The notion that rural programs can be used to facilitate adjustment of resources and not to subsidize resources to remain in the sector was developed in the work of D. Gale Johnson and others in the 1940s (see, e.g., Johnson, 1947, 1950). However, the United States has never implemented major policies of this sort, and many U.S. farm programs seem designed to have the opposite effect and retain resources in agriculture in spite of market signals indicating they should leave.⁷

⁶ The design of such an institution raises several interesting questions. Should it be within the federal government or independent? How should it be funded? Who should set the agenda? To whom should it recommend? What should be the scope of industries and issues? Could an individual state usefully provide an institution of this type directed toward reforming national policies that harm that state, or must it be done at the national level?

⁷ Although the United States does have an agricultural trade adjustment scheme for industries hurt by imports, it is considered to be inadequate and ineffective (a) because it is too hard to qualify, and (b) because it has too little funding compared with the big subsidy programs. Only a few industries have qualified and they have been minor.

An extreme form of adjustment assistance may be to buy out the programs. In a few instances in Australia and the United States, explicit compensation has been paid to individuals suffering losses as a result of the elimination of particular farm commodity programs. In each instance, the programs involved rights to produce or sell the commodity, quotas, or allotments, and the government compensated the owners for the elimination of these rights. In the United States, in two cases where quotas (or allotments) were eliminated, peanuts in 2002 and tobacco in 2004, quota owners were compensated—and probably overcompensated.⁸ One wonders if a greater investment in economic analysis might have led to a different design for the form and rate of compensation, or whether the apparent overcompensation might have been deliberate and well-informed. Orden (2006) discusses both of these cases and speculates about the potential for a buyout for the U.S. sugar program. The same concepts could, however, be extended beyond quota programs to all types of farm programs, and it is interesting to consider the possibilities.

Conclusion

U.S. farm policy has undergone some significant shifts over the past 10 years. Changes introduced in the 1996 FAIR Act, combined with the 1994 WTO Agreement, appeared to promise a significant progressive withdrawal of the U.S. government from agricultural commodity markets. However, in the later 1990s, administrative decisions were taken to increase spending on farm programs beyond the FAIR Act commitments, and the 2002 FSRI Act confirmed those higher spending rates and reversed some other aspects of policy changes introduced in 1996 and in previous Farm Bills. More recently, U.S. farm program policies have been found in breach of the WTO Agreement. These shifts and other trends raise questions about what can be expected in the 2007 Farm Bill.

Mainstream U.S. farm interests, who have been the major beneficiaries from farm program policies, seem likely to favor a continuation of the status quo, perhaps with modest adjustments. Other interest groups appear to be pressing for more significant changes, in a variety of directions. The U.S. federal budget deficit will impose an upper limit on total Farm Bill spending and may imply some reduction overall.

More substantial pressure on spending, or at least on the form it takes, can be expected to come from other countries, through the WTO. The prevailing WTO Agreement can be expected to have implications for forms of U.S. Farm Bill policies and the amounts of support they may provide. The failure of the Doha Round to develop a new WTO Agreement suggests the URAA rules will likely apply when the new Farm Bill is enacted. At least one current U.S. commodity program—for upland cotton—is out of compliance with WTO rules, and the upland cotton case ruling may mean the United States has also exceeded its AMS limits.

Domestic pressure to reduce traditional uses for Farm Bill funds is coming from multiple sources, not just those who would favor smaller budget deficits. Among these competing pressures are environmental groups and growers of nonsupported crops who argue for redirecting the funds. Some say the balance of power is shifting whereby these groups will have significant influence on the 2007 Farm Bill, particularly since movement toward the provision of environmental amenities and support for nontraditional products may also help to bring the U.S. policies into compliance with the WTO

⁸ In the case of peanuts, new direct and countercyclical payments were introduced at the same time.

Agreement. We may be seeing the first warning signals of a sea change in the politics of U.S. farm policies.

Much of agriculture in the Western United States would stand to benefit from a shift toward reduced U.S. government involvement in agricultural commodity markets. The partial reversal of changes introduced in the 1996 Farm Bill over the past eight years shows how difficult it can be to achieve an enduring, substantial reform of U.S. farm program policies. A review of agricultural policy change in Australia and New Zealand suggests that, if a government has the will to eliminate farm program policies, such change may be facilitated by adopting a transparent, systematic, sector- or economy-wide approach and by providing adjustment assistance to encourage resource adjustment in recognition of the fact that change is costly. Explicit compensation measures may be a part of a reform package and, if we believe our estimates of deadweight losses, may be worth providing. The Western states could provide useful leadership on these issues.

[Received July 2006; final revision received November 2006.]

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