Farm Income and Farm Financial Conditions

Farm income conditions in the U.S. agricultural sector begin the new millennium at a low ebb. However, earnings are expected to bottom out in 2001 and then be on an upward trend for the rest of the decade. Despite the near-term cash flow difficulties facing the sector, a strong basic financial position achieved during the 1990s will help farmers weather the lows in major crop prices while exports and prices recover.

Net Farm Income and Government Payments

Net farm income prospects for the next decade are expected to be lower than for the decade of the 1990s. With the production, prices, and government payments currently projected, farm income will be notably lower for 2001 than has been forecast for 2000. Based upon these projections, net farm income for 2001 could fall below $35 billion, significantly lower than 1999's forecast of $48 billion and the 2000 forecast of $40 billion. From 2001 forward net farm income is expected to gradually recover as farm prices strengthen over the decade. The average net farm income for the decade 2000-2009 is projected to be about $44.6 billion compared with $45.8 billion average for 1990-1999. A record net farm income of $54.9 billion was set in 1996, a year of both exceptional harvests and market opportunities. In the baseline, income of this level is not reached until near the end of the first decade of the new millennium.

Total cash receipts from farm sales are expected to be very similar for 1999, 2000, and 2001. But government payments, which bolstered farm revenues in 1999 and will do so again in 2000, can be expected to be considerably less in 2001 and beyond. Total government payments, now forecast at $22.7 billion for 1999 and $17.2 billion for 2000, are projected fall to $10 billion in 2001 and continue trending downward through the first half of the decade. Under existing farm legislation, government payments should be expected to decline. Production flexibility payments, established in the 1996 Farm Act, were mandated to trend downward according to a declining fixed allocation budgeted for each successive year of the program. The reduction in production flexibility contract payments from calendar year 2000 to 2001 is expected to be about $900 million. Since these payments are decoupled, current commodity prices will have no impact upon the decline dictated by the provisions of the Act. Production flexibility contract payments are assumed to continue at the 2002 level through the remainder of the baseline.

Loan deficiency payments, which are intended to be countercyclical with commodity prices, also will have reduced importance as a component of government assistance. Because the CCC loan rates for many commodities are based upon a moving average of market prices, the lower prices experienced in recent years will reduce the applicable loan rate. The combination of lower loan rates and increasing market prices results in a smaller amount of the crop that will be eligible for benefits, and a smaller payment per each unit of the commodity produced. Lower loan rates are expected to have an impact beginning with 2001. As a result of modestly higher prices for several commodities and the lower loan rates offered, loan deficiency payments are expected to fall by more than $3 billion from 2000 to 2001.

The "emergency" provisions of the Omnibus Consolidated and Emergency Supplemental Appropriations Act for Fiscal Year 1999 and the Agricultural Appropriations Act of 2000 provided supplemental assistance in the form of market loss and crop loss payments, adding to gross income in 1998, 1999, and 2000. On a calendar-year basis these programs added $2.8 billion to farm revenues in 1998, and are forecast to provide $8.7 billion in 1999 and $2.4 billion in 2000.

In total, direct government payments to the farm sector will be down about $7 billion in 2001 from 2000, about the same as the projected decline in net farm income. Government payments then continue to be a less important component of farm sector income through the rest of the decade.

Farm Cash Receipts

Record net farm income in 1996 coincided with record U.S. agricultural export values of almost $60 billion. By 1999, exports had fallen to $49 billion, largely prompted by the economic crisis in previously rapid-growing Asian economies as well as by abundant worldwide supplies of most crops and livestock products. While U.S. exports have regained some of the lost ground in quantities exported, increased competition for export markets from other nations has provided continued pressure on export prices. Baseline projections indicate that exports will return to a period of steady growth throughout the decade. Prices and cash receipts are expected to rise as exports expand.

Total cash receipts from sales of farm commodities can be expected to grow at more than 3.0 percent from 2000 onward. This rate of growth will be more rapid than the rate of expansion in cash receipts from 1990 to 1996. Expected growth will bring projected cash receipts from $190 billion in 2000 to $254 billion by 2009.

Reductions in acreage devoted to corn and wheat, occurring in response to low prices in 1999 and the early-2000s, will reverse direction by the middle of the next decade. Increasing acreage for corn and wheat will put total plantings near the 1997-98 levels by the end of the baseline. By contrast, soybean acreage is projected to reach a high in 2000 and is then expected to decline to levels approximating 1997-98 within first few years. Overall, total crop output expands through the baseline. Additionally, recovering crop prices will be important to expanding crop receipts over the next decade. By 2009, crop cash receipts are projected to be $137 billion as compared with the $93 billion forecast for 2000.

Livestock receipts, in contrast to crops, are forecast at a near-record level of $96 billion for 2000, and from there will continue to grow to $114 billion by 2009. The magnitude of increase in livestock receipts is projected to be less than half of the gain in crop receipts. Cattle and calf returns represent 30 percent of the increased livestock receipts; pork, 7 percent; broilers, 15 percent; and dairy, 38 percent.

Cattle production for the 1990s reached a high in 1999, due in part to a sustained liquidation of the beef herd (primarily heifers), which also led to weak producer prices. In 2000, however, sharply lower supplies of feeder cattle and a comparable drop in beef production are expected. Cattle production is expected to be below the 1999 output through the remainder of the baseline. Lower beef supplies, in turn, are expected to lead to stronger prices and ultimately to expanded cash receipts. Cash receipts are expected to be 16 percent higher in 2009 than 2000, even without an increase in production.

Changes in the structure of the pork industry have ushered in production and marketing changes that will result in annual output averaging about 13 percent more during 2000-09 than the average for 1990-99, and prices averaging about 16 percent less. In the midst of rapid restructuring, 1998-99 hog prices fell significantly. Annual average hog prices are expected at about $36 a hundredweight in 2000, up from 1999's low of $32, and are projected to reach $40 a hundredweight by 2009, which is well below the $47 average price for the 1988-1997. Both hog production and prices are expected to increase only marginally throughout the baseline. In all, hog cash receipts will increase by 16 percent from 2000 to 2009, growing at only a little more than 1.5 percent a year. The structural changes that have been occurring in recent years have lowered the cost of production and may have lengthened the producers' planning horizon. For large operations and for producers under contracts to processors with substantial investments in existing plants, production plans may be based more on the outlook for prospects over several years rather than several months. Earnings of the producers under contract are determined by fee schedules established in the contract and less tied to cash market prices. These changes can cause output and prices to be more stable in the next decade, but total annual revenue from hog production is likely to remain very close to the average for the previous decade.

Broiler output has been steadily rising over the last decade, and shows no indication of changing course. Production is projected to continue to rise steadily between 2000 and 2009, resulting in a 24-percent increase in output by the end of the decade. Cash receipts for poultry are expected to rise at about 2 percent annually, reflecting output increases which average about 2 percent per year and moderate price increases.

Farm Production Expenses

Farm production expenses are expected to grow modestly over the entire baseline. In the next few years farmers will try to adjust their costs in the face of lower income prospects, but these efforts will be somewhat hampered by price increases. Feed purchases will be lower in 1999-2001, reflecting lower cattle numbers and crop prices, but cattle numbers will recover and feed crop prices will rise. Seed expenditures will grow slowly as crop acreage recovers.

Prices of fuel and oil, which were low in 1998 and early 1999, grew dramatically in the second half of 1999 as OPEC agreed to enforce production quotas. Even with larger equipment and machinery-saving field crop practices, overall costs of fuel and oil are expected to increase over the decade. Fertilizer and pesticide expenses also are expected to increase, reflecting higher prices and recovery in area planted.

Hired labor expenses, about 12 percent of total production costs, are expected to increase an average of 2.4 percent annually, also reflecting, in part, increased sector output.

While anxiety over inflationary pressures prompted Federal Reserve actions to boost rates for 2000, interest rates from 2001 to 2009 period are expected to be stable at slightly lower rates. At the same time, current low prices and expected receipts will prompt farmers to manage debt carefully and lenders to be cautious in offering credit. In the short term the cautious behavior of both farmers and borrowers should result in a decline in debt in 2001 and 2002. The combination of lower debt levels and retreating interest rates are expected to reduce interest expenses in 2001 and 2002. The conservative behavior of borrowers is expected to result in a low rate of increase in debt as prices and farm cash receipts recover. Consequently, debt and interest expenditures are expected to be very stable for the remainder of the baseline. As a share of production costs, interest payments, which averaged 13 percent in the 1980s and 7.3 percent in the 1990s, are expected to decline slightly to about 6.9 percent over the next decade.

Rental payments to non-operator landlords are expected to fall in 2000 and 2001, paralleling the lower expected crop earnings. In recent experience, share rents have been more downwardly responsive than cash rents. Rents are most likely to rise again as crop receipts begin rising and area planted increases. The projection is for rental expenditures to rise by about 38 percent from 2000 to the 2009 while crop cash receipts are rising 47 percent

Farm Balance Sheet

With reduced farm income and cash flow over the next few years, debt management will be crucial to the financial condition of the agricultural sector. Even with the near-term cash flow difficulties facing the sector, a strong basic financial position achieved during the 1990s will help farmers weather the lows in major crop prices until exports and prices recover. In the longer run, increasing farm incomes and relatively low interest rates will contribute to asset accumulation and assist in debt management, thus leading to an improving balance sheet.

The value of farm real estate, the largest component of farm assets, is expected to stagnate in the next few years. Average farmland values per acre are not currently forecast to fall on a nationwide basis. In the past the value of farmland has been slow to respond to decreases in farm income. Cash receipts for crops for 2000, an important variable in assessing land values, are very close to the 1990-99 average. Additionally, the value of farmland also is affected by pressures from non-agricultural sources such housing and recreational uses. Assuming that farmland maintains its value in the near term with growth again as cash receipts recover and that farm debt remains stable, the financial balance sheet of the aggregate farm sector should weather the current decline in cash income and end of the baseline period in a strong position.

Table 31. Farm receipts, expenses, and incomes in nominal dollars

	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
						Billion dollars						
Cash receipts:												
Crops	102.2	95.1	93.3	96.6	100.4	105.5	110.7	115.5	120.9	126.9	132.0	136.9
Livestock and products	94.5	96.9	96.5	95.3	97.0	100.0	103.1	105.9	108.7	111.4	114.1	117.0
All commodities	196.8	191.9	189.9	191.9	197.5	205.5	213.8	221.5	229.6	238.3	246.2	253.9
Farm-related income	13.8	14.4	14.1	14.3	14.6	14.9	15.2	15.5	15.8	16.1	16.4	16.7
Government payments	12.2	22.7	17.2	9.9	8.1	7.3	6.2	6.1	6.0	6.0	6.0	6.0
Gross cash income	222.8	229.1	221.1	216.2	220.1	227.7	235.1	243.0	251.4	260.3	268.5	276.5
Cash expenses	167.8	170.0	171.5	172.4	174.8	180.1	185.2	190.1	195.2	200.5	206.0	210.9
Net cash income	55.0	59.1	49.7	43.8	45.4	47.5	49.9	52.8	56.2	59.9	62.5	65.6
Value of inventory change	-1.0	-1.4	-0.1	0.2	0.5	1.1	0.5	0.6	0.6	0.7	0.9	0.6
Non-money income	11.3	11.5	11.6	11.6	11.8	12.0	12.2	12.4	12.6	12.8	13.1	13.3
Gross farm income	233.1	239.1	232.7	228.0	232.3	240.8	247.8	256.0	264.6	273.8	282.5	290.5
Noncash expenses	15.8	15.6	15.3	15.7	16.0	16.3	16.4	16.4	16.3	16.3	16.3	16.3
Operator dwelling expenses	5.4	5.5	5.5	5.5	5.5	5.5	5.5	5.5	5.6	5.6	5.6	5.6
Total production expenses	189.0	191.1	192.3	193.6	196.2	202.0	207.1	212.1	217.1	222.3	227.8	232.8
Net farm income	44.1	48.1	40.4	34.4	36.1	38.8	40.7	43.9	47.6	51.5	54.7	57.7
Farm assets	1,064.3	1,067.2	1,072.8	1,075.8	1,088.1	1,119.5	1,160.4	1,200.8	1,245.0	1,293.7	1,347.3	1,402.9
Farm debt	172.9	172.8	172.5	166.8	168.2	170.4	172.3	174.0	175.6	177.1	179.1	180.8
Farm equity	891.4	894.4	900.4	909.0	919.9	949.2	988.1	1,026.8	1,069.4	1,116.6	1,168.2	1,222.2
						Percent						
Debt/equity ratio	19.4	19.3	19.2	18.3	18.3	17.9	17.4	16.9	16.4	15.9	15.3	14.8
Debt/assets ratio	16.2	16.2	16.1	15.5	15.5	15.2	14.8	14.5	14.1	13.7	13.3	12.9

Table 32. Farm receipts, expenses, and incomes in 1992 dollars

	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
						Billion 1992 dollars 1/						
Cash receipts:												
Crops	90.7	83.2	80.4	81.2	82.2	84.1	85.9	87.3	88.9	90.9	92.1	92.9
Livestock and products	83.9	84.7	83.1	80.1	79.4	79.6	79.9	80.0	79.9	79.8	79.6	79.5
All commodities	174.6	167.9	163.5	161.2	161.6	163.7	165.9	167.3	168.9	170.7	171.7	172.4
Farm-related income	12.2	12.6	12.1	12.0	11.9	11.9	11.8	11.7	11.6	11.5	11.4	11.3
Government payments	10.8	19.9	14.8	8.3	6.6	5.8	4.8	4.6	4.4	4.3	4.2	4.1
Gross cash income	197.7	200.4	190.5	181.6	180.1	181.4	182.4	183.5	184.9	186.4	187.2	187.8
Cash expenses	148.9	148.7	147.7	144.9	143.0	143.5	143.7	143.6	143.6	143.6	143.6	143.2
Net cash income	48.8	51.7	42.7	36.8	37.1	37.9	38.7	39.9	41.3	42.9	43.6	44.5
Value of inventory change	-0.9	-1.2	-0.1	0.2	0.4	0.9	0.4	0.4	0.5	0.5	0.6	0.4
Non-money income	10.0	10.1	10.0	9.8	9.6	9.6	9.5	9.4	9.3	9.2	9.1	9.1
Gross farm income	206.8	209.2	200.4	191.6	190.1	191.8	192.3	193.4	194.6	196.1	197.0	197.3
Noncash expenses	14.0	13.6	13.2	13.2	13.1	13.0	12.7	12.4	12.0	11.7	11.3	11.1
Operator dwelling expenses	4.8	4.8	4.8	4.6	4.5	4.4	4.3	4.2	4.1	4.0	3.9	3.8
Total expenses	167.7	167.2	165.6	162.7	160.6	160.9	160.7	160.2	159.7	159.2	158.9	158.1
Net farm income	39.1	42.1	34.8	28.9	29.5	30.9	31.6	33.2	35.0	36.9	38.1	39.2
Farm assets	944.2	933.7	924.1	904.0	890.3	891.9	900.2	907.0	915.7	926.5	939.6	952.6
Farm debt	153.4	151.2	148.5	140.2	137.6	135.7	133.7	131.4	129.1	126.8	124.9	122.7
Farm equity	790.8	782.5	775.5	763.9	752.7	756.2	766.5	775.6	786.6	799.7	814.6	829.9

1/ Nominal dollar values divided by the GDP deflator.