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# **New York Economic Handbook 2003**



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This publication contains information pertaining to the general economic situation and New York agriculture. It is prepared primarily for use by professional agricultural workers in New York State. USDA reports provide current reference material pertaining to the nation's agricultural situation. Many of these reports are available on the internet at: <http://www.usda.gov/newsroom.html>

The chapters in this handbook are available in PDF format on the Applied Economics and Management outreach website: <http://aem.cornell.edu/outreach/materials.htm>



# Chapter 1. Websites for Economic Information and Commentary

Steven C. Kyle, Associate Professor

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1.	<a href="http://www.whitehouse.gov/news/fsbr.html">http://www.whitehouse.gov/news/fsbr.html</a>	<i>Economic Statistics Briefing Room</i> Easy access to latest Federal data at national level
2.	<a href="http://www.economagic.com/">http://www.economagic.com/</a>	<i>Economagic: Economic Times Series Page</i> Easy access to figures and graphs of important data from a variety of sources for the present as well as going back decades into the past
3.	<a href="http://www.bea.doc.gov/">http://www.bea.doc.gov/</a>	<i>Bureau of Economic Analysis Home Page</i> Links to: State level GSP figures (Gross State Product) A Survey of Current Business BEA news releases Overview of U.S. economy Many data sources
4.	<a href="http://www.dismal.com/">http://www.dismal.com/</a>	<i>"The Dismal Scientist"</i> Good site for commentary on current events; latest leading indicators; calendar of economic data releases; dictionary of economic terminology; and much more
5.	<a href="http://www.nber.com/">http://www.nber.com/</a>	<i>National Bureau of Economic Research</i> Access to the latest cutting edge academic research Also the home of business cycle analysis
6.	<a href="http://www.federalreserve.gov/">http://www.federalreserve.gov/</a>	<i>Federal Reserve</i> Latest news on monetary policy Functions of Federal Reserve General information on national banking system Links to regional Federal Reserve Bank sites Many articles on national economy at this, plus regional, sites
7.	<a href="http://stats.bls.gov/">http://stats.bls.gov./</a>	<i>Bureau of Labor Statistics</i> Latest employment figures
8.	<a href="http://www.conference-board.org/">http://www.conference-board.org/</a>	<i>The Conference Board</i> Latest leading indicators -- to reach directly, go to <a href="http://www.tcb-indicators.org/">http:// www.tcb-indicators.org/</a> Consumer confidence index
9.	<a href="http://europa.eu.int/">http://europa.eu.int/</a>	<i>European Union</i> Links to economic information and news for all members of the European Union

<p>10. <a href="http://www.worldbank.org/">http://www.worldbank.org/</a>  <a href="http://www.imf.org/">http://www.imf.org/</a>          Best single sources for data and information on other countries          Includes cross country data banks; news releases; information on the organizations' structures and activities</p>	<p><i>The World Bank and          the International Monetary Fund</i></p>
<p>11. <a href="http://www.economic-indicators.com/">http://www.economic-indicators.com/</a>  <i>Indicators</i></p>	<p>Website for Mark Rogers' book, <i>The Handbook of Key Economic Indicators</i>          For web links which track news on economic indicators and other facets of the current economy</p>
<p>12. <a href="http://globalfindata.com/">http://globalfindata.com/</a> - A variety of long term financial data.</p>	<p>Stock Markets: Dow Jones, S&amp;P (Composite, Industrials, Rails, Telephones, Utilities), United Kingdom, Germany, France, Japan Exchange Rates: Dollar/Pound Interest Rates: US AAA Corporate Bonds, US Government Bonds, British Government Securities          Inflation: US Consumer Prices, US Wholesale Prices, UK Consumer Prices Commodities: Chicago Corn, Chicago Wheat, US Cotton, US Gold, US Silver</p>
<p>13. <a href="http://www.developmentgateway.org/node/244175/">http://www.developmentgateway.org/node/244175/</a></p>	<p>The best source for international commodity prices is through the World Bank website. Commodity Prices from the World Bank include: Coal, Australia; Coal, US; Crude oil, average spot; Crude oil, Brent; Crude oil, Dubai; Crude oil, West Texas Int.; Natural gas, Europe; Natural gas, US; Cocoa; Coffee, Other Milds; Coffee, Robusta; Tea, auctions; Tea, London auction; Coconut oil; Copra; Groundnut meal; Groundnut oil; Palm oil; Soybean meal; Soybean oil; Soybeans; Maize; Rice, Thai, 5%; Rice, Thai, 35%; Rice, Thai, A1.Special; Sorghum; Wheat, Canada; Wheat, US, HRW; Wheat, US, SRW; Bananas; Beef; Fishmeal; Lamb; Oranges; Shrimp; Sugar, EU, domestic; Sugar, US, domestic; Sugar, world; Logs, Malaysia; Logs, Cameroon; Plywood; Sawn wood, Malaysia; Sawn wood, Ghana; Wood pulp; Cotton; Jute; Rubber, Malaysia; Rubber, NY; Rubber, Singapore; Sisal; Wool; DAP; Phosphate rock; Potassium chloride; TSP; Urea; Aluminum; Copper; Gold; Iron ore; Lead; Nickel; Silver; Steel products (8) index; Steel, cold rolled coilsheet; Steel, hot rolled coilsheet; Steel, rebar; Steel, wire rod; Tin; Zinc</p>

## Chapter 2. The Marketing System

Kristen S. Park, Extension Support Specialist and William Drake, Extension Associate

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### Retail Update

The Food Marketing Institute (FMI) reports that in 2002, weekly visits to the supermarket remained stable at 2.2 trips. Expenditures declined, however, with the average household spending \$87 per week for groceries in 2002 versus \$91 in 2001. Per capita spending fell from \$38 in 2001 to \$36 in 2002. The soft sales environment and economizing behavior on the part of consumers has created a promotional sales environment that has persisted through 2002. Retailer and manufacturer margins are being pressured as a result. (Source: Food Marketing Institute, *Consumer Attitudes and the Supermarket, 2002*)

The mid-Atlantic region saw a net increase of 66 supermarket stores (1.7%) in the April 2001 – April 2002 time period. This growth is in line with the national average of 1.8 percent for this time period. Fifty-three of the 66 stores (80%) were concentrated in formats that are relatively new to the region:

- limited assortment stores (40), e.g., Aldi and Save-A-Lot
- supercenters (13), primarily Wal-Mart

Both of these formats utilize aggressive, everyday pricing as the core feature of their go-to-market strategy. The rapid growth of these formats in the region is likely to further pressure retailer and manufacturer margins as price competition intensifies.

Currently, the mid-Atlantic region is home to disproportionately few supercenter format stores (63). However, the region is targeted for significant expansion by Wal-Mart. An indicator of the region's significant potential for further supercenter development is the fact that the region contains 14 percent of the nation's population but only 3.7 percent of the country's supercenters.

It should be noted that the entry of supercenters and limited assortment retailers might offer unique opportunities for manufacturers and producers in the region. For example, an upstate New York firm has secured the position as Wal-Mart's primary fluid milk supplier for the state. Similar opportunities may exist for regional agricultural producers and marketers. (Sources: Wal-mart; *Progressive Grocer*)

New food products totaled 9,598 items in 2001 (Table 2-1). A breakdown of products by grocery category illustrates the continued innovation by manufacturers in categories such as bakery, beverages, confectionery, and sauces and seasonings.

Category	Total Items-2001
Baby food	60
Bakery	1,200
Beverages	1,212
Breakfast cereals	91
Confectionery	1,442
Dairy	414
Desserts & ice cream	495
Fruit & vegetables	176
Meals & meal centers	539
Pet food	183
Processed fish	655
Sauces/seasonings	1,291
Side dishes	261
Snacks	794
Soup	217
Spreads	456
Sweeteners	21
Weight control	91

Source: New Product News, January 2002.

### The U.S. Food Marketing System

According to the forecast for the Consumer Price Index (CPI), food prices are predicted to increase approximately 2.1 percent by year-end of 2002. This is lower than the CPI for food in 2001 which increased 3.1 percent. Food items which are predicted to contribute a *negative* influence on the index, in other words which will see lower prices, are:

- fish and seafood (-1.7%)
- pork (-0.6%)
- fats and oils (-0.4%)

Food items predicted to see increases over the average price increase of 2.1 percent are:

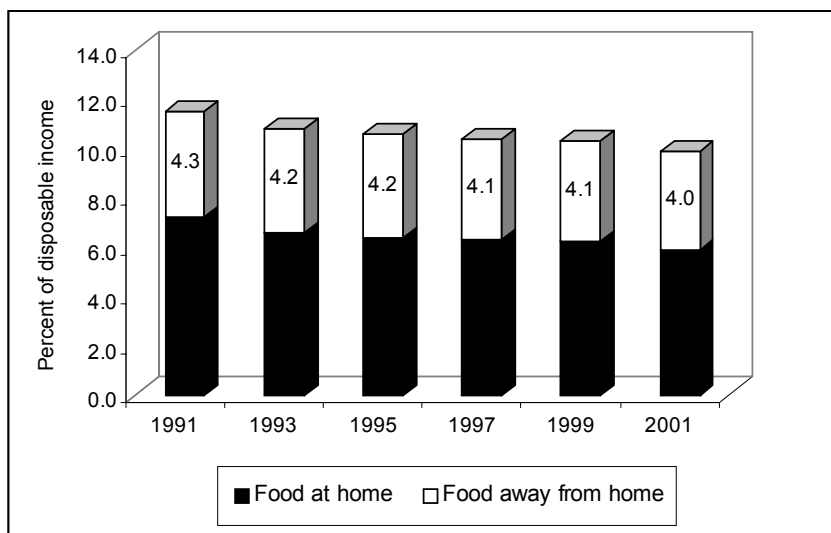
- fresh vegetables (7.1%)
- processed fruits and vegetables (4.0%)
- meats other than beef, veal, pork, and poultry (3.4%)
- sugar and sweets (2.2%)

The Bureau of Labor Statistics which releases these figures, predicts similar trends for the year 2003 with an overall CPI of 2 to 2.5; declines in prices for pork and eggs; and increases for other meats, fresh vegetables, processed fruits and vegetables, and sugar and sweets.

Wage gains, in general, have surpassed slight food price gains, leading to a continued decrease of food expenditures when stated as a percent of disposable income. Food expenditures as a share of disposable personal income was 10.0 percent in 2001 (Figure 2-1). This continued a long, downward trend in one of the measures of food costs for the U.S. public.

Even expenditures for food away from home, which include higher labor costs than for food at home, have decreased although not as rapidly as those seen for food at home expenditures.

FIGURE 2-1. FOOD EXPENDITURES AS A SHARE OF DISPOSABLE PERSONAL INCOME



Expenditures include food purchases from grocery stores and other retail outlets, including purchases with food stamps and WIC vouchers and food produced and consumed on farms (valued at farm prices) because the value of these foods is included in personal income. Excludes government-donated foods. Purchases of meals and snacks by families and individuals, and food furnished employees since it is included in personal income. Excludes food paid for by government and business, such as donated foods to schools, meals in prisons and other institutions, and expense-account meals.

Source: USDA-ERS, <http://www.ers.usda.gov/briefing/CPIFoodAndExpenditures/Data/table7.htm>. June 18, 2002.

The economy in 2001 even took its toll on food sales. Sales in the food system in 2001 grew a total of \$35.2 billion or 3.8 percent over the previous year (Table 2-2). This compared to the gains in 2000 over 1999 which were \$70.8 billion. Despite the deep blow to the foodservice sector after 9-11 last year, this sector, overall, had a better year than food at home and posted an absolute dollar gain of \$17.9 billion compared to an increase of only \$13.0 billion from food at home sales.

This increase in total U.S. food sales does not contradict the observed decrease in food expenditures per household described on page 1. Rather, the population and number of households being formed increased more the amount of total food sales.

Sector	Sales 2000 <sup>†</sup>	Sales 2001	Increase	Growth
	--\$ billion--		--\$ billion--      --% change--	
Total food and beverage sales	915.4	950.6	35.2	3.8
Total food sales (excluding alcohol)	813.4	844.2	30.8	3.8
Food at home sales	430.9	443.9	13.0	3.0
Food away from home sales	382.4	400.3	17.9	4.7
Alcoholic beverage sales	102.0	106.4	4.4	4.3

<sup>†</sup> revised figures

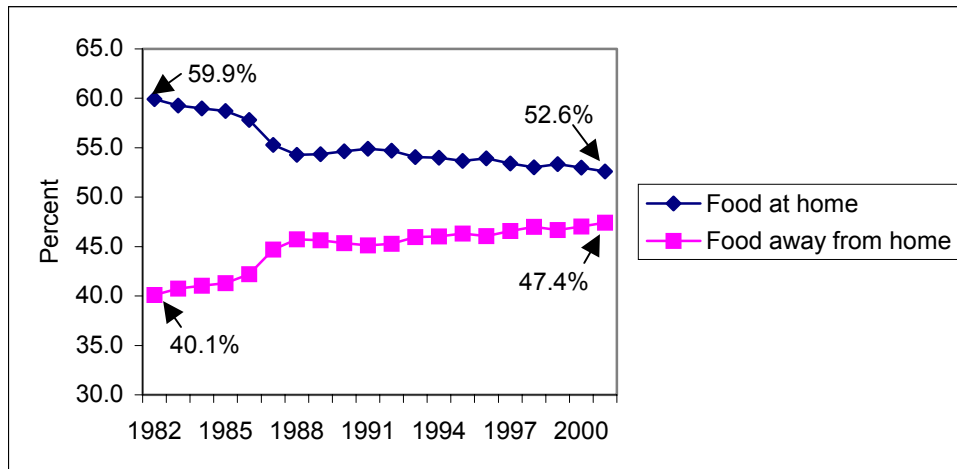
Source: USDA-ERS, <http://www.ers.usda.gov/briefing/CPIFoodAndExpenditures/Data/table1.htm>, last updated: June 18, 2002.

The strong away from home consumer food expenditures constituted 47.4 percent of total consumer food expenditures (Figure 2-3), a somewhat surprising increase over 46.7 percent the year before, considering



the slump in the last quarter of 2001. Consumer food expenditures for food at home were still greater than away from home sales; however, the gap continues to narrow.

FIGURE 2-3. PERCENT OF TOTAL CONSUMER FOOD EXPENDITURES, AT HOME AND AWAY FROM HOME



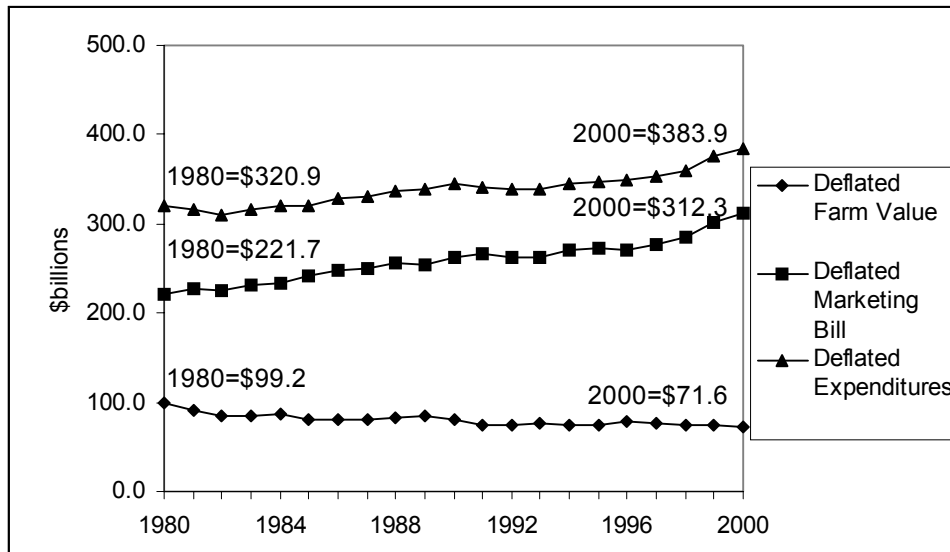
Source: USDA-ERS, <http://www.ers.usda.gov/briefing/CPIFoodAndExpenditures/Data/table1.htm>, June 18, 2002.

Changes in the economy, consumer trends, and market competition have played roles in increasing consumers' food expenditures. As a whole, consumer food expenditures have risen, even in real or constant terms after inflation is accounted for. This increase in food expenditures has been due to costs added post farm-gate. The farm value or share of food expenditures has steadily been decreasing in real dollars, and in 2000, the latest year figures could be obtained, was \$71.6 billion, or 18.7 percent of consumer food expenditures (Figure 2-4). This was down, in real terms, from \$99.2 billion, or 30.9 percent, in 1980. Therefore, increases in food expenditures have been for expenses or costs added to food after it has been produced on the farm.

The increases observed post farm-gate can be attributed, at least in part, to: (see Figure 2-5)

- wage gains
- increased demands for convenience including additional processing and manufacturing, more expensive high-tech packaging, and product development costs
- transportation
- increased efforts in food safety
- increased energy use
- a greater share of food consumed away from home, food which is more expensive than that purchased for home

FIGURE 2-4. CONSUMER FOOD EXPENDITURES—FARM VALUE AND MARKETING BILL, IN CONSTANT, DEFLATED DOLLARS



Source: USDA-ERS, <http://www.ers.usda.gov/briefing/foodpricespreads/trends/>. September 3, 2002.

FIGURE 2-5. WHAT A DOLLAR SPENT ON FOOD PAID FOR IN 2000, IN CURRENT DOLLARS

farm value \$123.3 billion  
marketing expenses \$537.8 billion



Source: USDA-ERS, Food Marketing and Price Spreads: USDA Marketing Bill. <http://www.ers.usda.gov/briefing/foodpricespreads/bill/components.htm>. June 21, 2002.

Global agricultural trade remains vital to the national food system. Exports from U.S. suppliers to trading regions around the world support national sales. Imports serve a dual function; one, of providing competition to U.S. products, and two, providing complementary products suppliers can use to better serve their U.S. customers. Imports as a share of U.S. food consumption have increased since the mid-1990s and have remained steady since 1998. In 2000, 8.8 percent of U.S. food consumption came from imported products. Approximately 12.3 percent of food crops and crop products were imported, while 4.2 percent of animal products, including fish and shellfish, were imported (USDA-ERS, "The Import Share of U.S. Consumed Food Continues to Rise," July 2002). In 1992, imports constituted approximately 7 percent of food consumed in the U.S.

## Chapter 3. Cooperatives

Bruce L. Anderson, Associate Professor  
Brian M. Henehan, Senior Extension Associate

### U.S. Situation

The most complete data available on U.S. agricultural cooperatives are collected through an annual survey of marketing, farm supply and selected service cooperatives conducted by the Rural Business-Cooperative Service of the USDA. Results of the most recent survey are summarized in Table 3-1. Additional analysis of the data reported for 2001 was obtained from USDA Rural Development staff.

Table 3-1. UNITED STATES AGRICULTURAL COOPERATIVE NUMBERS, BUSINESS VOLUME, AND NET INCOME 2000-2001 <sup>1</sup>							
Major Business Activity	<u>Number</u>		<u>Net Volume</u>		<u>Net Income</u>		
	<u>2000</u>	<u>2001</u>	<u>2000</u>	<u>2001</u>	<u>2000</u>	<u>2001</u>	<u>2001</u>
			(\$ billion)		(\$ million)		
Marketing	1,672	1,606	72.1	75.0	867		810
Farm Supply	1,277	1,234	24.1	24.8	311		429
Related Service	397	389	3.5	3.5	98		118
TOTAL	3,346	3,229	99.7	103.3	1,276		1,357

<sup>1</sup> Totals may not add due to rounding.

Source: Farmer Cooperative Statistics, 2000, Rural Business - Cooperative Service, USDA, RBS Service Report 60, Washington, D.C., December, 2001 and preliminary release from Rural Business - Cooperative Service, USDA, October 22, 2002.

The number of cooperatives in the United States has continued to decline to 3,229 in 2001, a net decrease of 117 associations. This is primarily due to ongoing consolidation and merger of local grain marketing and supply cooperatives in the Midwest. The rate of decline decreased over the past year compared to 2000. Total net business volume, which excludes intercooperative business, amounted to \$103.3 billion, up from 2000.

Sales of milk and dairy products increased by 15 percent. Livestock and poultry sales also showed gains. However, sales by other marketing cooperatives declined with fruits and vegetables off by \$700 million in 2001.

Supply sales climbed 2.8 percent, due mainly to higher petroleum prices. Petroleum sales increased nearly \$1 billion. Feed and fertilizer sales also grew from the previous year.

Total net income for 2001 was \$1.4 billion, up from 2000 which was the lowest net income level since 1993. Although net income increased for dairy cooperatives, that gain was offset by lower margins for poultry, rice, sugar, and livestock.

Combined assets in 2001 for all cooperatives reached \$48.7 billion, down 2.5 percent from 2000. Net worth totaled nearly \$20.1 billion, down slightly from the previous year.

### New York State Situation

Data for agricultural cooperatives headquartered in New York State were obtained from the Cooperative Service survey cited previously. State level data are collected every other year. The most current statistics available are for 1997 and 1999. Table 3-2 summarizes cooperative numbers and business volume for New York State.

Table 3-2. NEW YORK STATE AGRICULTURAL COOPERATIVE NUMBERS AND NET BUSINESS VOLUME BY MAJOR BUSINESS, 1997 and 1999 <sup>1</sup>				
Major Business Activity	Number Headquartered in State		Net Volume	
	1997	1999	1997	1999
<u>Marketing:</u>				(\$ million)
Dairy	63	67	1,171.7	1,595.2
Fruit & Vegetable	9	9	285.8	492.4
Other Products <sup>2</sup>	7	6	353.6	353.5
TOTAL MARKETING	79	82	1,811.1	2,441.1
<u>Supply:</u>				
Crop Protectants			36.1	34.5
Feed			133.1	121.3
Fertilizer			55.3	54.1
Petroleum			244.9	182.5
Seed			23.3	17.1
Other Supplies			139.2	152.2
TOTAL SUPPLY	11	11	631.9	561.7
<u>Related Service</u> <sup>3</sup>	6	5	152.6	232.5
TOTAL	96	98	2,595.6	3,235.3

Source: Farmer Cooperative Statistics, 1999, RBS Service Report 59, USDA, RBS, Washington, DC, 2000 preliminary release and Farmer Cooperative Statistics, 1998. RBS Service Report 57, USDA, RBS, Washington, DC, November 1999.

<sup>1</sup> Totals may not add due to rounding.

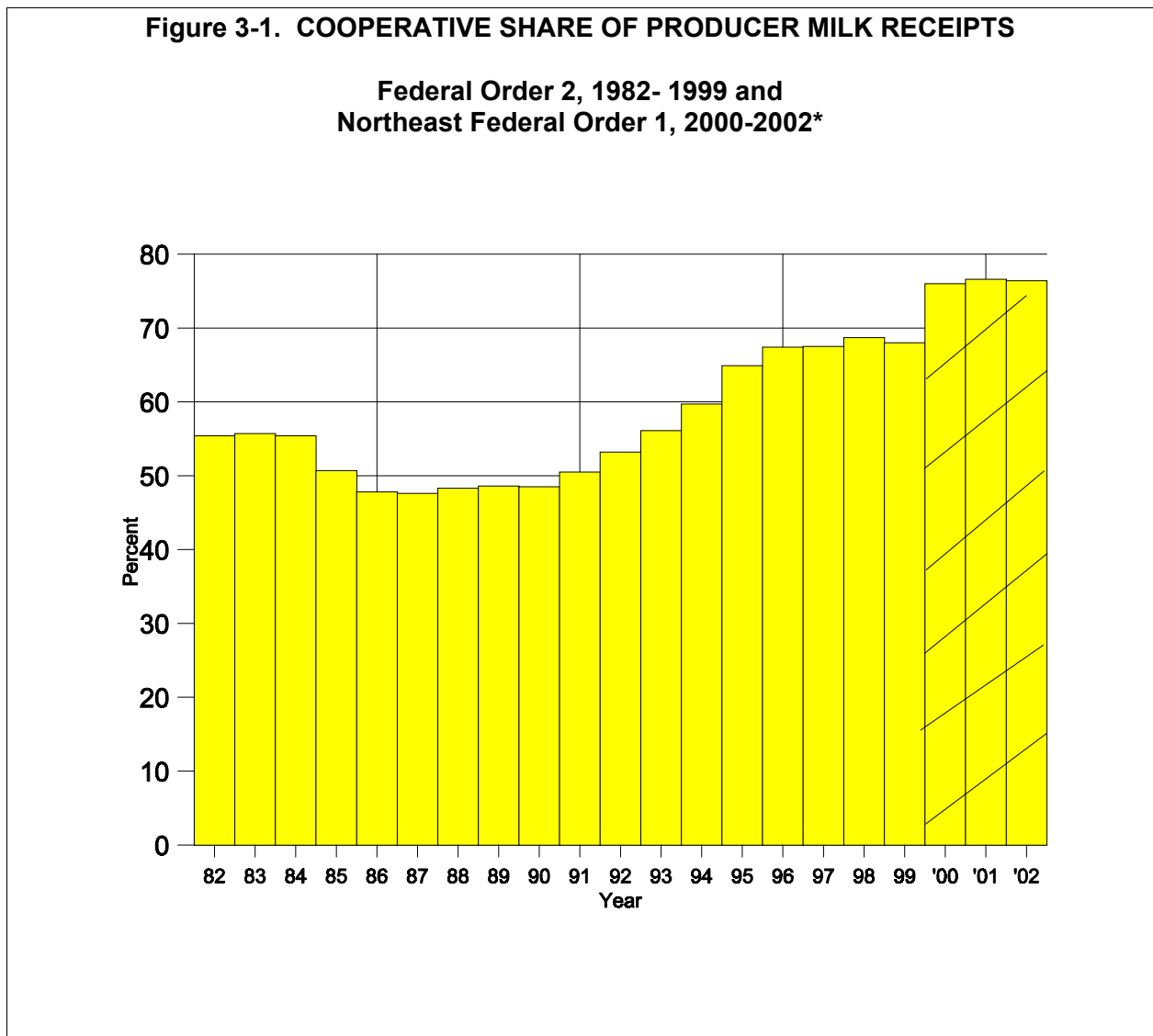
<sup>2</sup> Includes wool, poultry, dry bean, grains, livestock, maple syrup, and miscellaneous.

<sup>3</sup> Includes those cooperatives that provide services related to cooperative marketing and purchasing.

The number of agricultural cooperatives in New York State in 1999 showed a net increase of 2 cooperatives from 1997, with an increase in dairy cooperatives and a decrease in the number of marketing as well as service cooperatives. Total net business volume grew significantly from \$2,598 million in 1997 to \$3,235 million in 1999, an increase of 25 percent from 1997. Supply cooperative volume decreased by \$72 million with lower sales of petroleum, feed and seed. Marketing volume increased by \$630 million with dairy and fruit & vegetable marketing cooperatives showing significant increases in volume over the two year period. Total volume of other products marketed through cooperatives remained the same. A significant portion of the increased revenues for dairy and fruit and vegetable cooperatives came from the higher value of products sold as well as more volume. Total volume for services related to marketing or purchasing grew from \$153 million to \$232 million over the two-year period.

**Cooperative Share of Northeast Federal Milk Marketing Order 1**

As indicated in Figure 3-1, the proportion of milk receipts handled by dairy cooperatives fluctuated over the twenty-year period and leveled off at about 67 percent from 1996 to 1999 under the old Order 2. However, the cooperative share of milk receipts increased significantly to 76 percent under the new consolidated Order combining former Federal Order 1 (New England), Federal Order 2 (New York-New Jersey), and Federal Order 4 (Middle Atlantic) into the new Northeast Milk Marketing Order 1. The increase following the consolidation of Orders was primarily the result of pre-existing higher percentages of milk being shipped to cooperatives in the former Orders 1 and 4. Those higher percentages increased the total average of milk received by cooperatives in the new Order 1. The cooperative share of milk receipts for the first nine months of 2002 remained stable from the previous year.



\* The year 2002 is based on data for the first nine months of the year. Data from the year 2000 forward represent the consolidated Federal Milk Marketing Order 1 (the result of a merger of the old Federal Orders 1, 2, and 4).

Source: Market Administrator's Office, Northeast Federal Milk Marketing Order 1.

## **Cooperative Performance**

Financial performance of major agricultural cooperatives was extremely mixed in 2002, not just in New York or the Northeast, but across the country.

Due to their significance in the Northeast we will start by examining dairy cooperatives' share of producer milk receipts as well as recent events, review important developments in other types of cooperatives, and finally look at some major factors likely to influence cooperatives in the coming year.

As indicated by Figure 3-1, the proportion of milk receipts handled under the Northeast Milk Marketing Order 1 by dairy cooperatives remained relatively steady in 2001 and the first nine months of 2002. However, over 76 percent of all milk received in Order 1 is marketed through dairy cooperatives. This is the next highest cooperative share since 1974, and about 20 percentage points higher than a decade ago. However, some of this increase is due to milk marketing order mergers in 1999.

As predicted last year, the dairy industry continues to experience significant consolidation. The joint procurement and marketing arrangement between the two largest New York dairy cooperatives continues to work well for both parties. The strategic alliance has reduced assembly, sales and administrative costs.

About a year ago the largest U.S. dairy cooperative, which has a major presence in New York, entered into a 50 percent ownership of their fluid and soft product operations with private owners. The cooperative's profitability and credit rating remained strong throughout the year. In mid-November 2002, this company announced a pending merger with the largest private dairy company in New England.

Despite relatively weak milk prices at the farm level over the last year, the financial performance of Northeast milk marketing cooperatives was relatively strong in 2002. One cooperative had good results primarily due to its membership in another dairy processing cooperative and experienced a turn-around from 2001. A second organization with a very strong brand name continued its growth in the hard products consumer market. A third profitable milk marketing cooperative with no major physical assets continued its expansion into services for dairy farmer members.

Dairy related cooperatives generally experienced increased profitability despite weak milk prices. The major artificial insemination cooperative operating in the Northeast has been experiencing increased sales (some internationally) and profitability. The primary dairy herd improvement cooperative also reported increased sales and profitability. In fact, they are aggressively pursuing mergers with other DHI cooperatives, including Pennsylvania and Texas. Even the major cooperative livestock marketing organization in the Northeast, a subsidiary of a milk marketing cooperative, has been doing well after decades of struggle.

The major supply cooperative in the Northeast declared bankruptcy on October 1, 2002. Unfortunately this is not a unique trend. On May 31, 2002, the largest cooperative in the U.S. and a supply cooperative, also declared bankruptcy. Both cooperatives are in Chapter 11 re-organizations. And we understand a few other large supply cooperatives are experiencing financial difficulties. However, one major Mid-western supply cooperative has been doing extremely well financially.

What were the reasons for these bankruptcies? We have identified three primary factors. First, agricultural production experienced rapid structural change, and some cooperatives did not keep up with this evolution. More farmers today are buying direct and bypassing traditional supply firms. Traditional organizations maintained a significant investment in fixed assets, many operating at significantly less than capacity, resulting in a major cost burden. Second, many supply cooperatives became very diversified. In fact, the Northeast supply cooperative announced the planned divestiture of four businesses (i.e.

agronomy and seeds, leasing, insurance and a speciality seed plant), while the Mid-west supply cooperative may divest of everything except their meat business. Finally, both of these cooperatives were very highly leveraged.

The major vegetable and fruit cooperative, headquartered in New York but operating throughout the country, also experienced a traumatic change in 2002. On August 19 it sold majority interest in its processing and marketing operations to a merchant bank. This was done to reduce its debt and meet new accounting rules that require the write-down of intangible assets (i.e. goodwill), which were the result of major acquisitions in recent years. It is anticipated this new ownership structure will allow greater investment in advertising as well as new product development. While the cooperative still maintains a significant, but minority, investment in the continuing entity, the cooperative is currently exploring its future role in the vegetable and fruit industry. It should be added, that several question marks remain. The biggest one being: what will happen to the processing and marketing firm once the merchant bank decides to sell its current investment? Our best guess, based on historical strategies of merchant banks, is that this could happen anywhere from 3 to 7 years from now.

The major grape cooperative in New York reported strong sales and record returns to growers. Increased marketing efforts in terms of new product development, increased spending on advertising, and positive public reaction to health research has helped increase the consumption of grape products. Their investment in a strong brand name with associated consumer awareness were their saving graces this year. Grape cooperatives marketing bulk, unbranded juice suffered. This was due to a significant volume of low priced bulk grape juice on the market.

The farm credit cooperatives had good financial performance during the year. Despite weak prices for many agricultural products conservative lending policies served credit cooperative well in 2002.

While some large well-known cooperatives experienced poor performance and financial difficulties, interest in and creation of new cooperatives continues.

### **Cooperative Outlook**

While, New York and Northeast cooperatives had extremely mixed results in 2002, many are financially strong. The weak and uncertain economy has caused the adoption of more conservation strategies on the part of many cooperatives.

We have been surprised by the relative strong health of many of our dairy related cooperatives, especially given very weak milk prices. Again, we attribute this to the sound and conservative strategies of dairy marketing, credit, artificial insemination, and dairy herd improvement organizations. We expect these to continue

Certainly, the general economy will be a major factor in 2003. There are pluses and minuses. On the plus side we have low inflation and interest rates as well as the lack of "irrational exuberance". While food purchases are only moderately impacted by the economy, there may be some switching down to lower cost commodity type products. Any military action in the Middle East is most likely to have a negative impact on consumer purchasing, and more importantly energy prices. We can also guarantee that there will be continued industry consolidation and structural change. This will most likely come in the form of more mergers and acquisitions, but unfortunately may even include a bankruptcy or two.



## Chapter 4. Finance

Eddy L. LaDue, Professor

Table 4-1. United States Farm Balance Sheet  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	2000	2001	2002 <sup>d</sup>
<i>billion dollars</i>							
<b>Assets</b>							
Real Estate	783	586	626	741	949	999	1,009
Livestock	61	47	71	58	77	73	73
Machinery	80	83	85	89	90	91	92
Crops <sup>a</sup>	33	23	23	27	28	25	25
Purchased Inputs	c	1	3	3	5	4	4
Financial Assets	26	33	38	49	57	59	58
Total	983	773	846	967	1206	1251	1261
<b>Liabilities &amp; Equity</b>							
Real Estate Debt	90	100	75	79	98	103	105
Nonreal Estate Debt <sup>b</sup>	77	78	63	72	86	89	92
Total	167	178	138	151	184	192	197
Owner Equity	816	595	708	816	1022	1059	1064
Total	983	773	846	967	1206	1251	1261
Percent Equity	83	77	84	84	85	85	84

<sup>a</sup> Excludes crops under CCC loan.

<sup>b</sup> Excludes CCC loans.

<sup>c</sup> Not available.

<sup>d</sup> Forecast

Table 4-2. Changes in Structure, United States Farm Balance Sheet  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	2000	2001	2002 <sup>c</sup>
<i>percent of total</i>							
<b>Assets</b>							
Real Estate	80	76	74	77	79	80	80
Livestock	6	6	8	6	6	6	6
Machinery	8	11	10	9	8	7	7
All Other <sup>a</sup>	6	7	8	8	7	7	7
Total	100	100	100	100	100	100	100
<b>Liabilities</b>							
Real Estate Debt	54	56	54	52	53	54	53
Nonreal Estate Debt <sup>b</sup>	46	44	46	48	47	46	47
Total	100	100	100	100	100	100	100

<sup>a</sup> Excludes crops under CCC loan.

<sup>b</sup> Excludes CCC loans.

<sup>c</sup> Forecast

Source: Agricultural Income and Finance Outlook, ERS, USDA, AIS-79, September 2002 and ERS, USDA Data Files and Briefing Room Forecasts. Forecast data represent a combination of these sources.

Table 4-3. Distribution of United States Farm Debt by Lender  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	1999	2000	2001 <sup>c</sup>
<i>billion dollars</i>							
<b>Real Estate</b>							
Farm Credit System	33.2	42.2	25.8	24.8	30.3	31.8	35.2
Individuals & Others	27.8	25.8	15.1	18.0	18.7	18.7	18.8
Commercial Banks	7.8	10.7	16.2	22.3	29.8	31.8	33.4
Farm Service Agency	7.4	9.8	7.6	5.1	3.9	3.5	3.6
Insurance Companies	12.0	11.3	9.7	9.1	11.5	11.8	12.0
CCC-Storage	<u>1.5</u>	<u>.3</u>	<u>a</u>	<u>0</u>	<u>0</u>	<u>0</u>	<u>0</u>
Total	89.7	100.1	74.4	79.3	94.2	97.6	103.0
<b>Nonreal Estate<sup>b</sup></b>							
Commercial Banks	30.0	33.7	31.3	37.7	42.0	44.5	44.4
Farm Service Agency	10.0	14.7	9.4	5.1	4.0	3.9	3.8
Merchants & Dealers	17.4	15.1	12.7	16.2	20.3	20.9	21.6
Farm Credit System	<u>19.7</u>	<u>14.0</u>	<u>9.8</u>	<u>12.5</u>	<u>15.9</u>	<u>16.7</u>	<u>19.2</u>
Total	77.1	77.5	63.2	71.5	82.2	86.0	89.0

<sup>a</sup> Less than .05 billion.

<sup>b</sup> Excludes crops under CCC loan.

<sup>c</sup> Forecast

Table 4-4. Market Share of United States Farm Debt by Lender  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	1999	2000	2001
<i>percent of total</i>							
Farm Credit System	32	32	26	25	26	26	28
Commercial Banks	23	25	35	40	41	42	41
Farm Service Agency	11	14	12	7	4	4	4
Insurance Companies	7	6	7	6	7	6	6
Individuals & merchants	<u>27</u>	<u>23</u>	<u>20</u>	<u>22</u>	<u>22</u>	<u>22</u>	<u>21</u>
Total <sup>a</sup>	100	100	100	100	100	100	100

<sup>a</sup> Excludes crops under CCC loan.

Source: Economic Research Service, USDA Data files.

Table 4-5. New York Farm Balance Sheet  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	1999	2000	2001
	<i>million dollars</i>						
<b>Assets</b>							
Real Estate	6178	6520	7768	8165	9020	9324	9817
Livestock	1527	983	1259	1138	1360	1360	1360
Machinery	1718	1875	1847	1838	1722	1657	1656
Crops <sup>a</sup>	561	491	540	352	252	308	328
Purchased Inputs	c	27	74	88	109	106	91
Financial Assets	607	668	666	670	845	917	945
Total	10591	10564	12154	12251	13308	13672	14197
<b>Liabilities &amp; Equity</b>							
Real Estate Debt	1038	1125	901	854	980	1011	1070
Nonreal Estate Debt <sup>b</sup>	1582	1472	1268	1318	1475	1545	1629
Total	2620	2597	2169	2172	2455	2556	2699
Owner Equity	7971	7967	9985	10079	10853	11116	11498
Total	10591	10564	12154	12251	13308	13672	14197
Percent Equity	75	75	82	82	82	81	81

<sup>a</sup> Excludes crops under CCC loan.

<sup>b</sup> Excludes CCC loans.

<sup>c</sup> Not available.

Table 4-6. Changes in Structure, New York Farm Balance Sheet  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	1999	2000	2001
	<i>percent of total</i>						
<b>Assets</b>							
Real Estate	58	62	64	67	68	68	69
Livestock	15	9	10	9	10	10	9
Machinery	16	18	15	15	13	12	12
All Other	11	11	11	9	9	10	10
Total <sup>a</sup>	100	100	100	100	100	100	100
<b>Liabilities</b>							
Real Estate Debt	40	43	42	39	40	40	40
Nonreal Estate Debt <sup>b</sup>	60	57	58	61	60	60	60
Total	100	100	100	100	100	100	100

<sup>a</sup> Excludes crops under CCC loan.

<sup>b</sup> Excludes CCC loans.

Source: Economic Research Service, USDA. Data revised November 2002.

Table 4-7. New York Farm Debt by Lender  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	1999	2000	2001
	<i>million dollars</i>						
<b>Real Estate</b>							
Farm Credit System	367	449	404	332	388	423	468
Individuals & Others	373	363	216	256	266	258	263
Commercial Banks	108	89	116	146	218	230	240
Farm Service Agency	145	192	156	116	94	87	86
Insurance Companies	26	26	9	4	14	13	13
CCC-Storage	<u>19</u>	<u>6</u>	<u>a</u>	<u>0</u>	<u>0</u>	<u>0</u>	<u>0</u>
Total	1038	1125	901	854	980	1011	1070
<b>Nonreal Estate</b>							
Commercial Banks	632	597	417	374	408	433	431
Farm Service Agency	284	287	219	176	176	172	169
Merchants & Dealers	338	257	216	274	344	361	367
Farm Credit System	<u>328</u>	<u>331</u>	<u>416</u>	<u>494</u>	<u>547</u>	<u>579</u>	<u>662</u>
Total <sup>b</sup>	1582	1472	1268	1318	1475	1545	1629

<sup>a</sup> Less than .5 million.

<sup>b</sup> Excludes CCC loans.

Table 4-8. Market Share of New York Farm Debt by Lender  
Current Dollars, December 31  
Excluding Operator Households

Item	1980	1985	1990	1995	1999	2000	2001
	<i>percent of total</i>						
Farm Credit System	27	30	38	38	38	39	42
Commercial Banks	28	26	25	24	25	26	25
Farm Service Agency	17	19	17	14	11	10	9
Insurance Companies	1	1	a	a	1	1	1
Individuals & Merchants	<u>27</u>	<u>24</u>	<u>20</u>	<u>24</u>	<u>25</u>	<u>24</u>	<u>23</u>
Total	100	100	100	100	100	100	100

<sup>a</sup> Less than .5 percent.

Source: Economic Research Service, USDA. Data revised November 2002.

Table 4-9. Nonaccrual and Nonperforming Loans  
Farm Credit System, December 31

Year	percent of loan volume	
	Nonaccrual	Nonperforming <sup>a</sup>
1988	6.5	12.3
1989	5.1	11.0
1990	4.5	9.7
1991	3.7	8.0
1992	2.7	6.0
1993	2.3	4.2
1994	1.9	2.9
1995	1.4	2.1
1996	1.1	1.5
1997	0.9	1.3
1998	1.8	2.1
1999	1.4	1.6
2000	0.9	1.2
2001	0.9	1.2
2002 (9/30)	1.1	1.4

<sup>a</sup> Nonaccrual plus accrual that are restructured or 90 days or more past due (impaired loans).

Source: Annual and Quarterly Reports of the Farm Credit System.

Table 4-10. Nonaccrual, Nonperforming, and Total Delinquent  
United States Commercial Banks, December 31

Year	Farm Nonreal Estate Loans			Farm Real Estate Loans		
	Nonaccrual	Nonperforming <sup>a</sup>	Delinquent <sup>b</sup>	Nonaccrual	Nonperforming	Delinquent
	percent of loan volume					
1985	6.1	7.3	10.1			
1986	5.9	7.0	9.4			
1987	4.2	4.8	6.5			
1988	2.9	3.3	4.5			
1989	1.9	2.3	3.7			
1990	1.6	1.9	3.1			
1991	1.6	1.9	3.2			
1992	1.5	1.8	2.8	1.0	1.3	2.1
1993	1.2	1.4	2.2	0.8	1.1	1.8
1994	0.9	1.1	2.0	0.9	1.4	2.4
1995	0.9	1.1	2.1	0.9	1.4	2.4
1996	1.0	1.3	2.4	1.0	1.7	2.8
1997	0.9	1.1	2.0	0.9	1.5	2.6
1998	0.9	1.2	2.2	1.0	1.7	2.9
1999	1.1	1.3	2.1	0.7	1.3	2.0
2000	1.0	1.2	2.1	0.8	1.4	2.3
2001	1.3	1.5	2.7	1.2	1.5	2.6
2002 (6/30)	1.3	1.8	2.9	1.1	1.6	2.6

<sup>a</sup> Includes nonaccrual and past due 90 days but accruing.

<sup>b</sup> Includes nonperforming and past due 30 to 89 days but accruing.

Source: Agricultural Financial Databook, Board of Governors of the Federal Reserve System.

Date	Farm Ownership <sup>a</sup>		Operating Loans <sup>a</sup>		Emergency Loans		Economic Emergency		Soil and Water <sup>a</sup>	
	U.S.	N.Y.	U.S.	N.Y.	U.S.	N.Y.	U.S.	N.Y.	U.S.	N.Y.
	percent of loan volume									
9/30/83	3	4	13	8	25	13	16	11	7	4
9/30/84	4	4	17	11	32	22	20	15	9	5
9/30/85	5	5	13	10	37	25	23	19	11	7
9/30/86	5	5	16	12	41	31	27	25	12	9
9/30/87	6	7	19	14	45	34	31	34	14	10
9/30/88	8	9	25	19	57	38	42	45	20	12
9/30/89	9	10	26	20	60	41	44	51	23	13
9/30/90	7	9	23	17	60	37	42	50	18	10
9/30/91	7	9	24	16	61	38	42	51	18	11
9/30/92	7	9	25	19	61	41	42	55	19	9
9/30/93	7	10	24	19	62	40	40	61	18	10
9/30/94	6	11	23	18	60	41	40	63	17	11
9/30/95	6	12	23	20	60	38	39	62	18	13
9/30/96	6	13	21	19	48	37	36	65	17	14
9/30/97	6	14	20	17	44	34	33	67	15	15
9/30/98	5	13	18	16	39	34	31	68	16	14
9/30/99	5	13	15	15	32	29	29	63	15	11
9/30/00	4	12	14	14	26	27	26	60	15	11
9/30/01	4	11	13	13	24	24	24	55	14	10
9/30/02	4	10	12	12	21	22	23	51	13	12

<sup>a</sup> Includes limited resource loans.

Source: FSA Report Code 616.

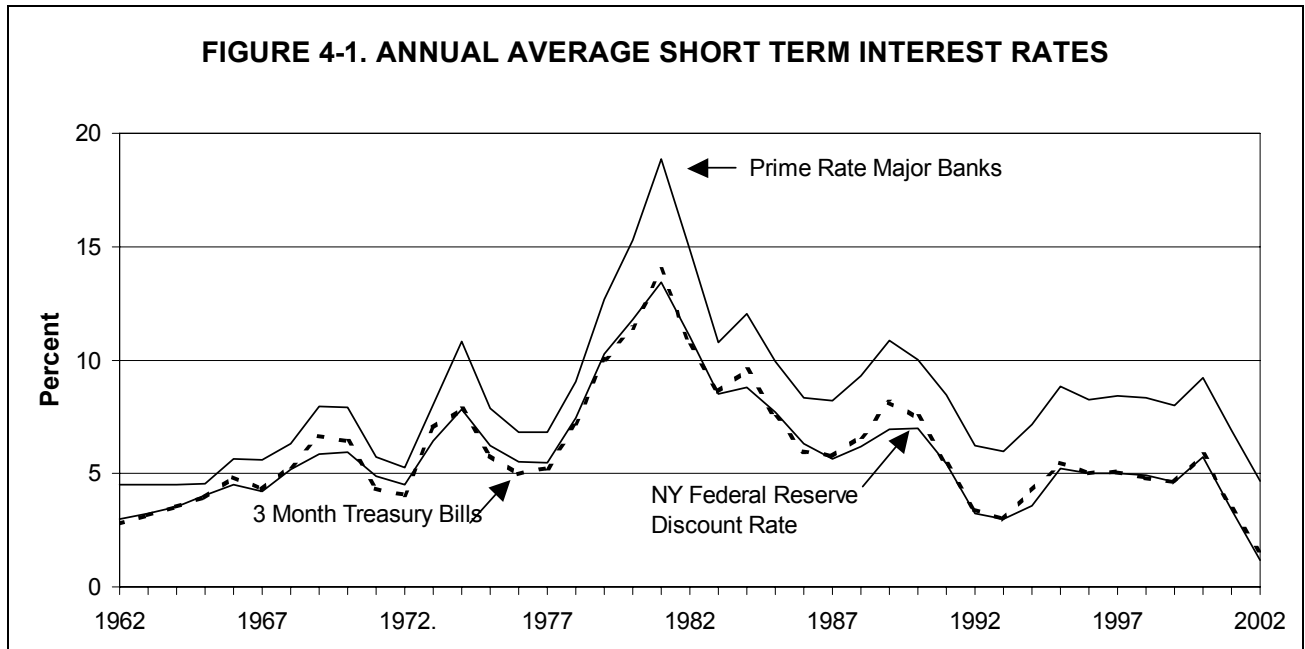
Date	Farm Ownership		Farm Operating	
	U.S.	N.Y.	U.S.	N.Y.
	percent of loan volume			
9/30/95	1	1	2	1
9/30/96	1	1	2	1
9/30/97	1	1	2	1
9/30/98	1	2	3	2
9/30/99	1	2	3	2
9/30/00	1	2	2	3
9/30/01	2	3	3	3
9/30/02	1	2	3	4

Source: FSA Reports 4067 and 4067-C.

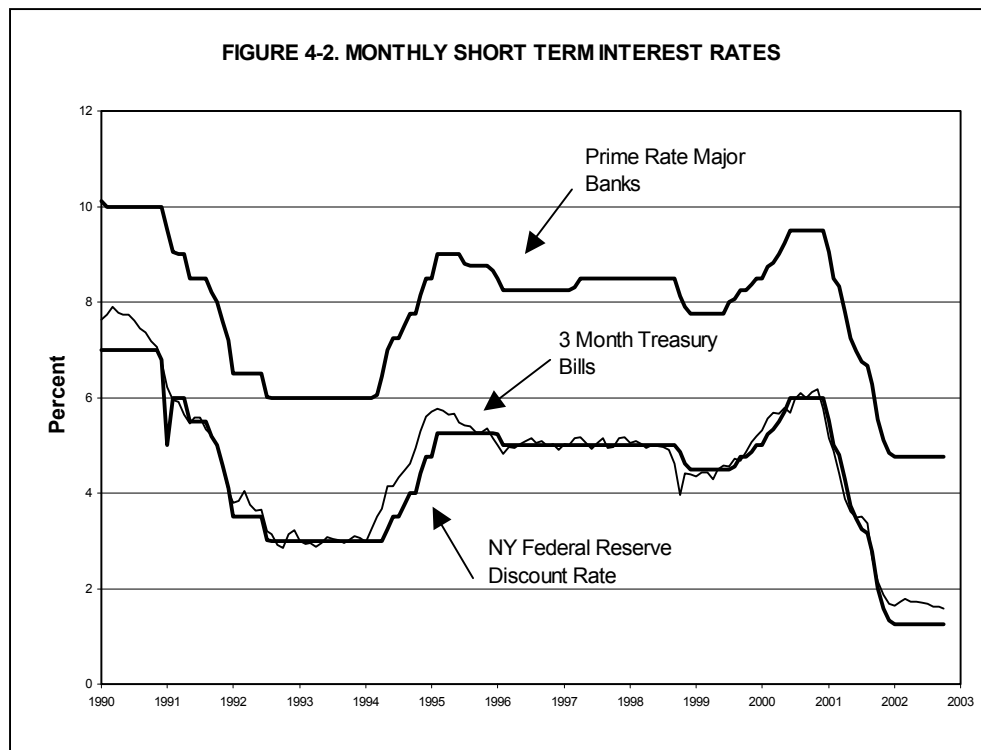
In spite of low commodity prices, capitalization of the generous 2002 Farm Bill payments into land values is resulting in higher farm real estate values. Farm real estate is expected to increase at least another one percent in 2002 following increases of seven and five percent in the last two years. An increase in cattle prices is offset by declines in hog prices to result in a constant total inventory of livestock.

Debt is expected to increase about three percent with non-real estate debt increasing somewhat more rapidly than real estate debt in 2002. Farmer equity is predicted to increase modestly. The net financial position of the nation's agriculture remains very strong with 84 percent equity.

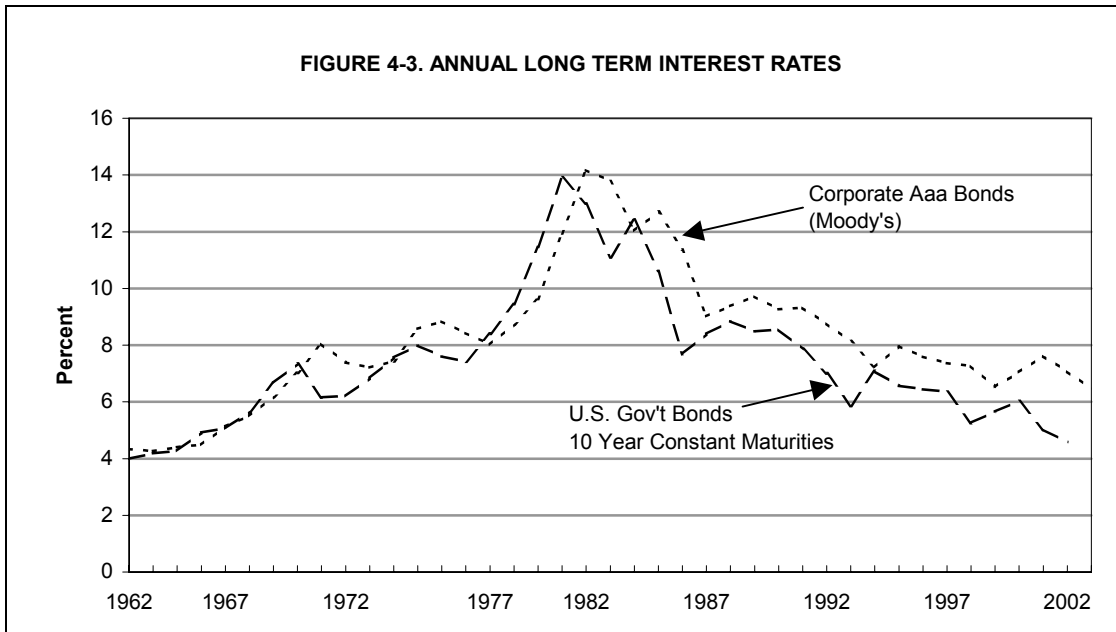
Market shares of the nation's agricultural debt shifted modestly during 2001 with the Farm Credit System experiencing a slight increase at the expense of commercial banks, individuals and merchants. Commercial bank continue to be the nation's most important agricultural lender with a 41 percent market share. The Farm Credit System, individuals and merchants provide most of the rest of agricultural credit.



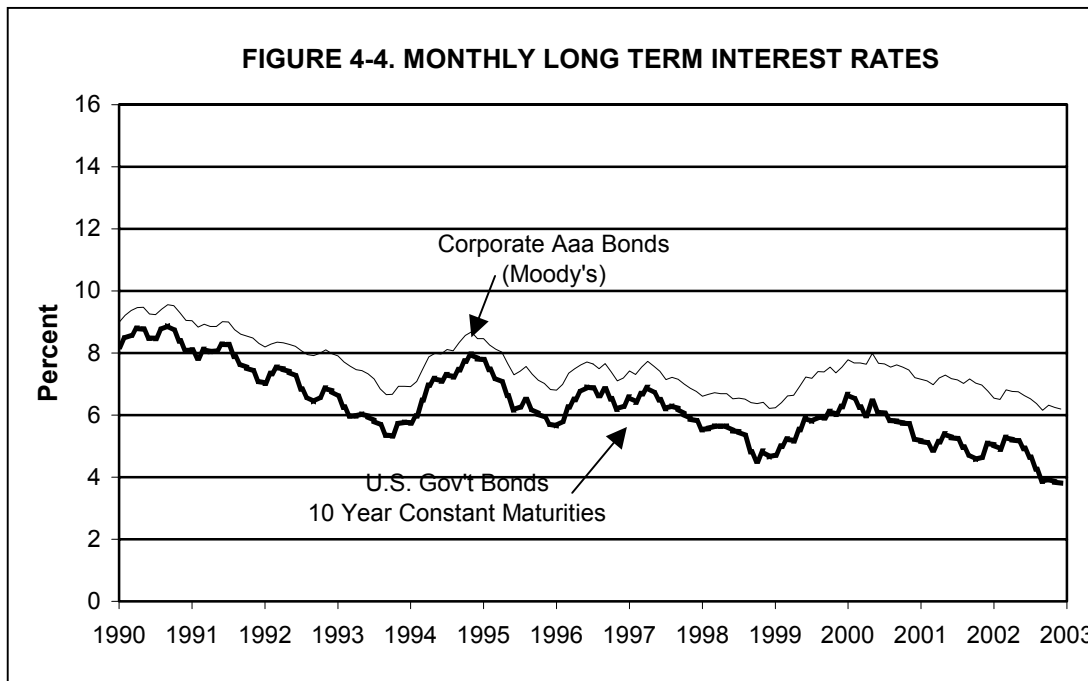
Following a precipitous decline in rates in 2001, short-term interest rates were constant throughout most of 2002. The only real change was a modest decline late in the year. Average 2002 short-term rates were about 1.8 percent below 2001 levels.



3 Month Treasury Bills		
	2001	2002
Jan.	5.15	1.65
Feb.	4.88	1.73
Mar.	4.42	1.79
Apr.	3.87	1.72
May	3.62	1.73
June	3.49	1.70
July	3.51	1.68
Aug.	3.36	1.62
Sept	2.64	1.63
Oct.	2.16	1.58
Nov.	1.87	
Dec.	1.69	

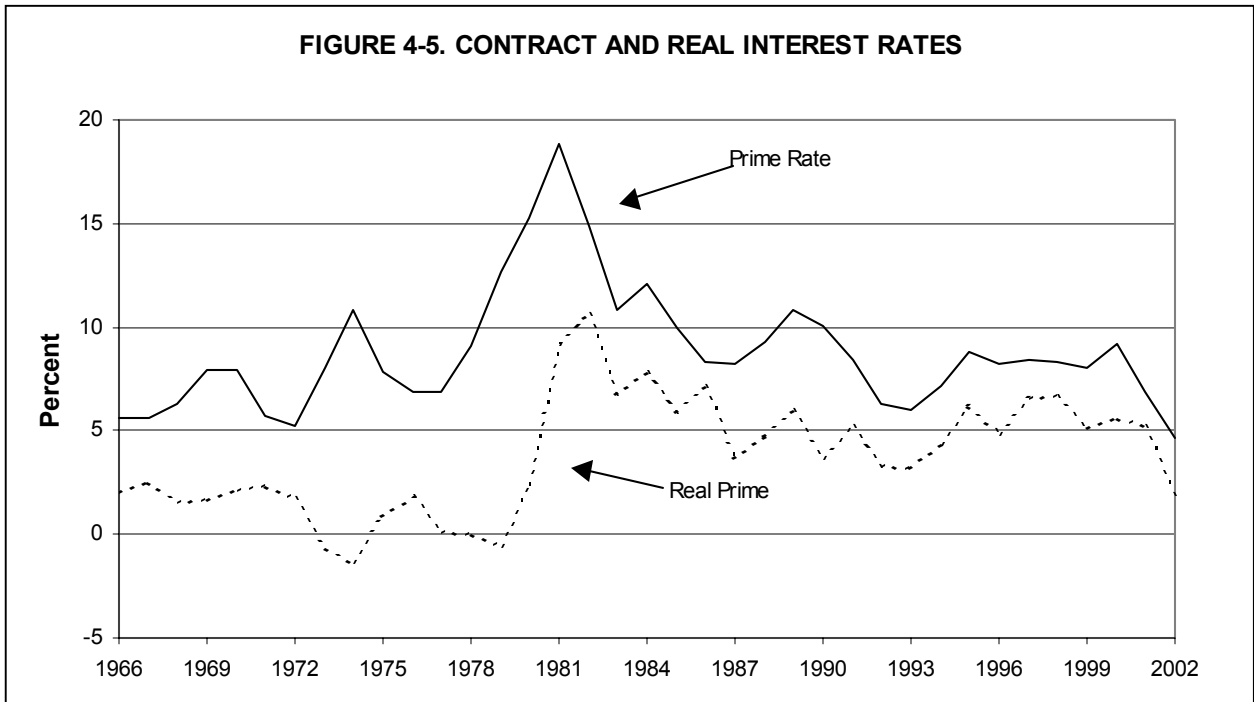


Basic long-term interest rates increased slightly early in 2002 and then generally slid to lower levels during the last half of the year. Average rates for the year were about one-half percentage point lower in 2002 than 2001.



U.S. Govt. Bonds		
10 Year Constant Maturity		
	2001	2002
Jan.	5.16	5.04
Feb.	5.10	4.91
Mar.	4.89	5.28
Apr.	5.14	5.21
May	5.39	5.16
June	5.28	4.93
July	5.24	4.65
Aug.	4.97	4.26
Sept	4.73	3.87
Oct.	4.57	3.94
Nov.	4.65	
Dec.	5.09	





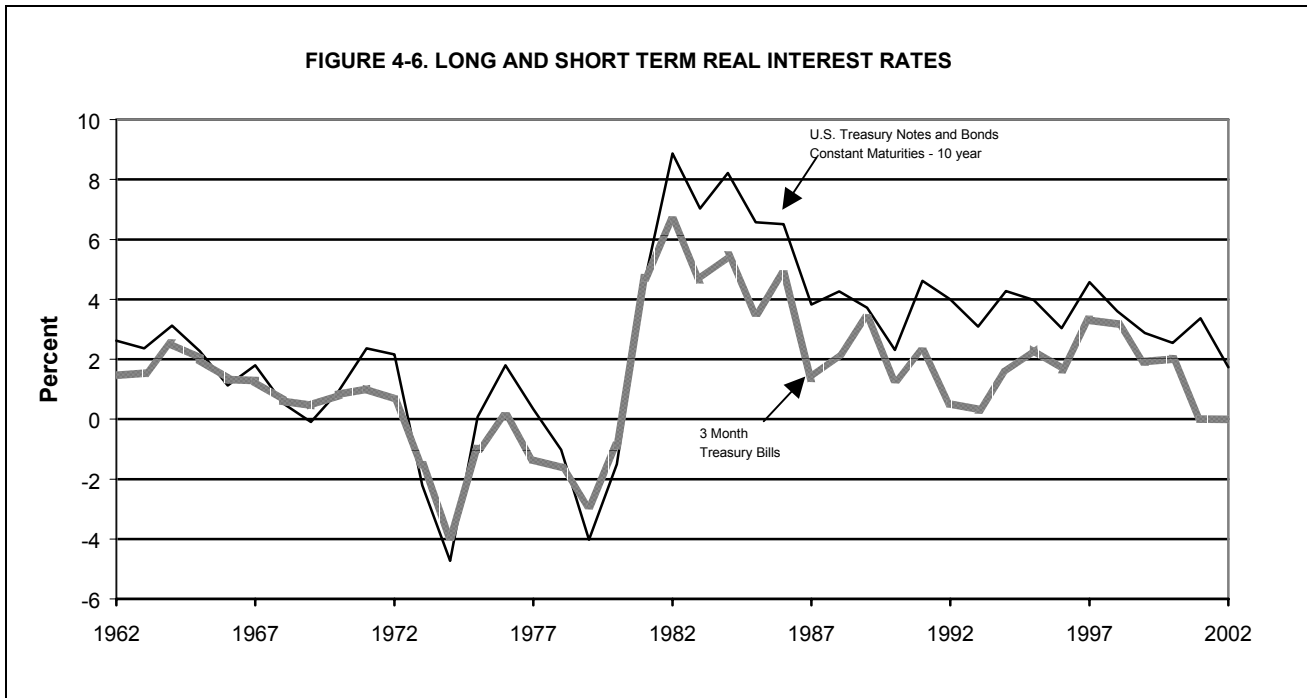
In New York, the Farm Credit System continues to be the dominant lender to agriculture with a 42 percent market share. Their market share has crept up during the last few years while the commercial bank market share has remained at about 25 percent.

The quality of lender portfolios remains strong. Nonaccruals and delinquent loans made by commercial lenders rose slightly during 2002, reflecting the stressed financial conditions in much of agriculture. The level of delinquency is still low. The Farm Service agency loans have experienced little change in delinquencies. Government payments have undoubtedly contributed to farmer's ability to make debt payments in spite of low commodity prices.

The Federal Reserve Board's aggressive reductions in short-term interest rates during 2001 created a very strongly upward sloping yield curve. The steepness of the curve became even greater in 2002 as a result of the decline in short-term rates exceeding the decline in long-term rates.

Throughout 2002, the economy has been on a recovery track. However, that recovery has been slow and irregular. The recovery slowed in the last quarter as the economy entered a "soft spot." The current weakness of the economy is caused by uncertainty about possible war with Iraq, the stock market and job prospects resulting from the weak economy itself. Although considerable uncertainty is expected to continue, most forecasters currently expect that the economy will improve with increasing speed throughout 2003. Sluggish growth in early 2003 is likely to be followed by growth in the 3 percent range late in the year. This should result in modest increases in interest rates in the last half of the year. Increases of three-quarters of a percent in short term rates and a slightly lower rise in long term rates are expected.

The sluggish economy will provide little inflation pressure. Inflation rates are expected to continue at 2002 rates of about 2.2 percent on a forth-quarter over forth-quarter basis.



Farm level interest rates are expected to remain at late 2002 levels well into 2003. Current rates are the lowest in about 40 years and will likely hold at that level for spring borrowing needs. Rate increases of one-half to three-quarters of a percent are likely late in the year. For the entire year farm level interest costs will likely be similar to the very favorable 2002 levels. While slight increases in farm loan delinquencies will cause lenders to carefully analyze agricultural loans, credit should be readily available for farmers with demonstrated repayment capacity. Current low milk prices, and the likelihood that it may be several months before significant price recovery occurs, means that lenders will be forced to carefully assess dairy businesses with repayment stress.

