

CHAPTER 2

Developments in 1989 and Future Prospects

THE UNITED STATES STARTED the eighth consecutive year of economic expansion during 1989, adding another 12 months to what was already the longest peacetime expansion in U.S. history. The duration of this expansion has been remarkable, and steady fiscal and monetary policies aimed at strong noninflationary growth have been essential for this achievement.

The Administration forecasts that growth will continue in 1990. Historical and international evidence shows that economic expansions do not die of old age. Expansions end because of particular external shocks to the economy, policy errors, or widespread imbalances, such as an overaccumulation of inventories, developing throughout the economy. Such imbalances were not evident in 1989, and with a continuation of fiscal and monetary policies aimed at deficit reduction and strong noninflationary growth, the chances of policy errors are reduced. Moreover, containing inflation during 1989 has set the stage for both sustained economic growth and continued reductions in inflation in the 1990s.

THE U.S. ECONOMY IN 1989

Adjusting for the effects of the 1988 drought, real gross national product (GNP) grew 1.9 percent during 1989, a more moderate pace than the very rapid rates of 5.4 percent in 1987 and 4.0 percent in 1988 (Chart 2-1). (Table 2-1 includes an explanation of the effects of the drought on GNP.) The civilian unemployment rate remained low throughout the year, ending the year at 5.3 percent. The average unemployment rate for 1989, also 5.3 percent, was at its lowest level since 1973. Moreover, inflation was contained: the fixed-weighted GNP price index increased 4.1 percent over the year, down from 4.5 percent in 1988.

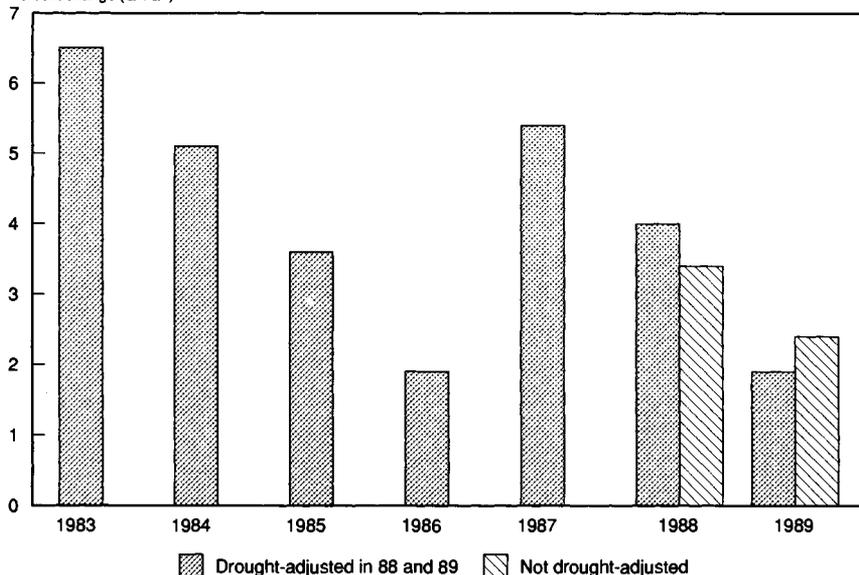
FISCAL AND MONETARY POLICIES DURING 1989

Fiscal and monetary policies played important roles in the economic performance of 1989. The path of fiscal policy reflected the Administration's commitment to deficit reduction without new taxes. The near-term emphasis of monetary policy shifted in the

Chart 2-1

GROWTH OF REAL GNP. GNP growth moderated in 1989 following two years of rapid expansion.

Percent change (Q4/Q4)



Source: Department of Commerce.

TABLE 2-1.—Growth of Real GNP and Components

	1986	1987	1988	1989 ¹
	Percent change, fourth quarter to fourth quarter			
GNP.....	1.9	5.4	3.4	2.4
GNP, drought-adjusted.....			4.0	1.9
Personal consumption expenditures.....	3.8	2.2	3.8	2.3
Nonresidential fixed investment.....	-5.5	8.5	4.2	4.3
Residential investment.....	11.6	-4.2	3.2	-6.1
Government purchases of goods and services.....	3.1	2.1	1.8	.2
	Annual level, billions of 1982 dollars			
Inventory investment.....	5.6	23.7	27.9	24.5
Net exports of goods and services.....	-129.7	-115.7	-74.9	-56.3

¹ Preliminary.

Note.—The loss of farm output from the drought lowered GNP in the last three quarters of 1988, reaching a loss of \$21.8 billion in the fourth quarter. The loss reduced real GNP growth in 1988 by 0.6 percentage point. The subsequent rebound of farm production to more normal levels added approximately the same amount to growth in 1989.

Source: Department of Commerce, Bureau of Economic Analysis.

spring of 1989. During 1988 and early 1989, monetary policy had aimed to keep inflation in check. By the spring of 1989, signs that economic growth was slowing and inflation was abating led to an easing of monetary policy.

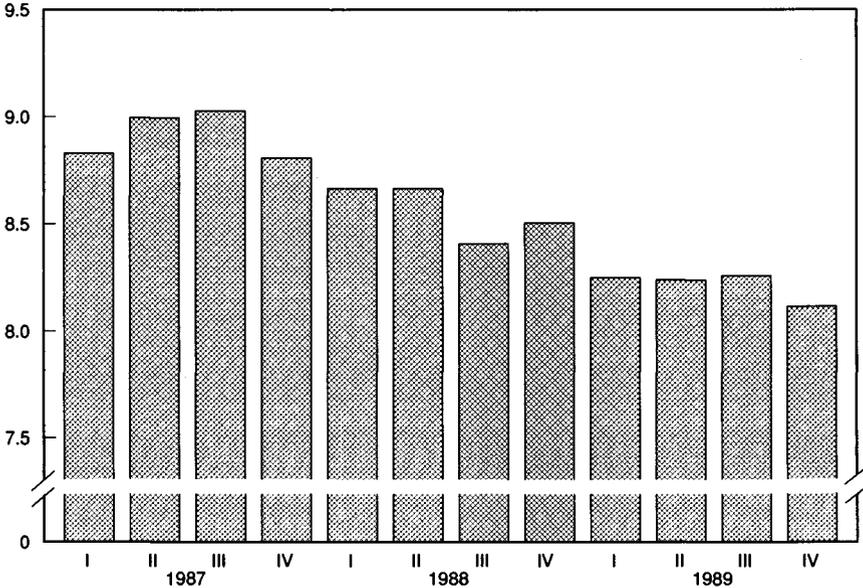
Fiscal Policy

Real Federal purchases of goods and services as measured in the national income and product accounts (NIPA) fell as a fraction of real GNP in calendar 1989, continuing a trend that began in 1987 (Chart 2-2). Reducing the Federal deficit helps to raise national saving and economic growth and is part of the Administration's strategy to achieve better long-run economic performance. Hence, controlling Federal spending remained a priority throughout the year despite the moderate slowing of economic activity during the latter half of 1989.

Chart 2-2

REAL FEDERAL PURCHASES. Real Federal purchases of goods and services continued to fall as a percent of real GNP in 1989.

Percent



Note: Transactions of the Commodity Credit Corporation are excluded.
Source: Department of Commerce.

An important aspect of fiscal policy during 1989 was the higher yield of the individual income tax system: personal income tax receipts as a percentage of personal income were above forecasts. This may partly reflect better compliance as a result of the tax rate reductions in the 1980s. Federal receipts, as measured in the NIPA, increased by \$74.4 billion in calendar 1989, reaching a total of \$1,046.8 billion. The increased revenues stemmed primarily from higher personal income tax and social insurance tax receipts.

During the last quarter of 1989, fiscal policy reflected the formulation of the budget for fiscal 1990. The President had submitted

initial proposals in February and reached agreement with the Congress in April on a budget plan of spending restraint that met the Gramm-Rudman-Hollings (GRH) deficit target for fiscal 1990. As the year progressed, however, the Congress did not implement the April agreement. Indeed, by the start of the fiscal year in October, the Congress had not passed most of the fiscal 1990 appropriations bills or budget reconciliation legislation.

In the absence of a completed budget, two successive continuing resolutions provided funds for Federal activities. The Administration estimated that the resulting deficit for fiscal 1990 exceeded the allowable GRH target by \$16.1 billion. Following the procedures in the GRH law, the President then ordered a sequester—a mandatory reduction in budget resources—designed to reduce outlays during the fiscal year by \$16.1 billion. (Box 3-1 in Chapter 3 of this *Report* contains a detailed discussion of the sequester in fiscal 1990.) Further, in the absence of a legislated budget containing genuine deficit reduction, the President announced his willingness to operate with a sequester for the entire fiscal year, if necessary. The Reconciliation Act passed by the Congress and signed by the President in December 1989 met the Administration's goals for deficit reduction. Importantly, the reduced outlays during the period were not restored: the President issued a revised sequester order intended to reduce outlays by \$5.7 billion, the equivalent of the \$16.1 billion sequester for roughly one-third of the fiscal year.

Federal purchases of goods and services, measured on a NIPA basis, totaled \$404.1 billion in calendar 1989, compared with about \$380 billion each in 1987 and 1988. Other expenditures by the Federal Government—transfer payments, grants to State and local governments, net interest paid, and so on—reached \$792.6 billion in 1989. Thus, expenditures by the Federal sector totaled \$1,196.7 billion for 1989, an increase of \$78.4 billion over 1988. The Federal Government budget deficit as measured by the NIPA was \$149.9 billion.

The Administration's goals for fiscal policy in 1989 included a reduction in the tax rate on capital gains. As a result of tax reform in 1986, the United States now taxes capital gains at a rate as high as that on other income. During its consideration of the 1990 budget, the Congress did not enact either the President's proposal for capital gains tax rate reductions or any of several congressional alternatives.

Much of the debate over a cut in the capital gains tax rate concerned its effect on the Federal budget. It is now generally agreed that these capital gains tax rate proposals would raise revenue in the short run, by encouraging the sale of previously "locked-in" assets. There is, however, debate over their long-run impact. A review of the available studies of this topic suggests that a careful-

ly designed capital gains tax rate reduction is not likely to lose revenue in the long run. Moreover, these studies do not include the beneficial effects of a capital gains tax rate cut on economic growth. By reducing the after-tax cost of capital, a cut in the capital gains tax rate will augment saving and investment and is likely to generate enough extra revenue to avoid long-run revenue losses. A reduction in the capital gains tax rate remains a priority for Administration fiscal policy in 1990.

Monetary Policy

The increased levels of resource utilization associated with the vigorous economic expansion during 1987 and 1988 created a concern by many that inflation would accelerate. To reduce the threat of rising inflation, the Federal Reserve began to tighten monetary policy in the spring of 1988 and continued to tighten until the spring of 1989.

In February 1989, the Federal Reserve announced ranges of growth for monetary and credit aggregates for the year. The ranges were 3 to 7 percent for M2, $3\frac{1}{2}$ to $7\frac{1}{2}$ percent for M3, and $6\frac{1}{2}$ to $10\frac{1}{2}$ percent for the debt of domestic nonfinancial sectors. (Box 3-2 in Chapter 3 of this *Report* contains definitions of the monetary aggregates.) The 1989 range for M2 was 1 percentage point lower than that for 1988, and the range for M3 was one-half percentage point lower. In establishing the ranges, the Federal Reserve noted that slower growth of money and credit was consistent with its goal of reduced inflation. At the same time, the Federal Reserve viewed the ranges of money growth as being sufficient to accommodate continued economic growth during 1989. Over the early part of 1989, M2 and M3 were at or below the lower bounds of their ranges.

The Federal Reserve continued to tighten policy by reducing the availability of bank reserves in early 1989. This tightening raised short-term interest rates and damped growth of money and credit; it can be seen in the increase in the key Federal funds interest rate—the rate on overnight interbank credit (Chart 2-3). Between the spring of 1988 and the spring of 1989, the Federal funds rate and other short-term interest rates rose about 3 percentage points.

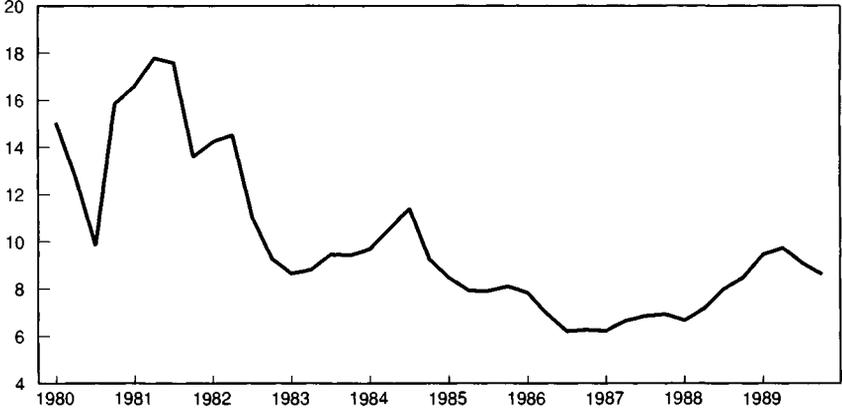
Interest rates on retail bank deposits also increased over this period but by considerably less than market rates, raising the “opportunity cost” of holding M2 deposits (Chart 2-4). The opportunity cost of M2 is defined as the difference between the return on an alternative asset—measured here as the interest rate on 3-month Treasury bills—and the average interest rate paid on the components of M2. That is, the opportunity cost is the interest forgone by holding funds in the form of M2 deposits rather than placing them in the market. The opportunity cost of M2 rose from about 1 percentage point in early 1988 to around 3 percentage points by early

1989 and was the major factor behind the slow growth of M2 over the first 3 months of 1989. During the following 2 months, households evidently drew down balances in order to meet unexpectedly large tax liabilities. As a result, M2 barely grew in April and actually contracted in May.

Chart 2-3

FEDERAL FUNDS RATE. Federal Reserve actions raised the Federal funds rate in 1988 and early 1989 but lowered it in the spring of 1989 as inflation pressures abated.

Percent per annum



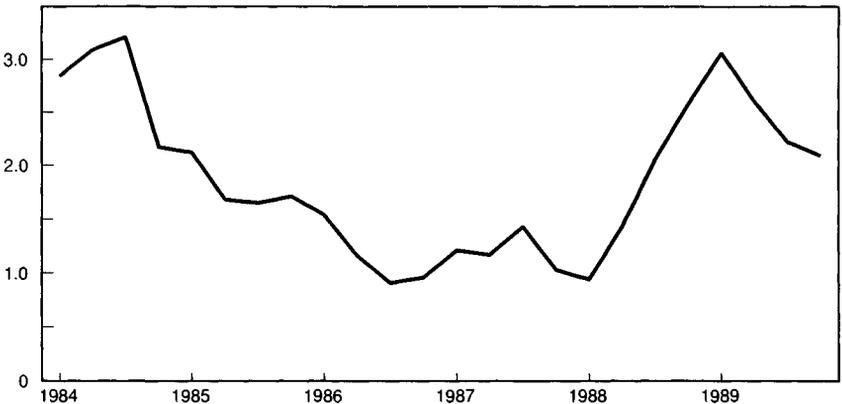
Note: Data are quarterly.

Source: Board of Governors of the Federal Reserve System.

Chart 2-4

M2 OPPORTUNITY COST. The opportunity cost of holding M2 deposits peaked in the first quarter of 1989 and declined over the rest of the year.

Percentage points



Note: Data are 2-quarter moving averages.

Source: Board of Governors of the Federal Reserve System.

By the spring, a number of factors suggested that the balance of risks was shifting from accelerating inflation to sluggish growth. These factors included the following: the slow growth of the mone-

tary aggregates, moderating demands for goods and services, the strength of the dollar on foreign exchange markets, a lack of acceleration in wages and total compensation rates, and a flattening of commodity prices. Low long-term interest rates relative to short-term interest rates added to the evidence. A low or negative spread between long-term and short-term interest rates is often viewed as an indicator that monetary policy is putting downward pressure on inflation. In the past, it has also frequently preceded recessions.

Accordingly, the Federal Reserve began to increase the availability of reserves to depository institutions. After remaining relatively flat from March through May, the Federal funds rate fell more than 1½ percentage points in the following months, bringing the rate to about 8¼ percent by early January of 1990. Other short-term market interest rates also declined substantially.

Lower market interest rates boosted the demand for monetary assets. Returns on M2 deposits fell less rapidly than did market interest rates, and the opportunity cost of M2 fell significantly. M2 was also increased by a rebuilding of tax-depleted balances. Over the May-to-December period, M2 growth averaged about 8 percent at an annual rate, a sharp pickup from the 0.2-percent average over the first 5 months of the year. For the year as a whole, M2 growth was about 4.5 percent—a little below the middle of its 3-percent to 7-percent target range (Chart 2-5).

M3 growth was also relatively weak over the first part of the year. In contrast to M2 growth, however, expansion of M3 remained sluggish following the easing of Federal Reserve policy over the second part of the year. A number of thrift institutions restrained growth in their balance sheets in order to comply with the more stringent capital requirements mandated by the Financial Institutions Reform, Recovery, and Enforcement Act of 1989. For the year as a whole, M3 expanded only 3.3 percent, slightly below the lower limit of its 3½ percent to 7½ percent target range (Chart 2-5).

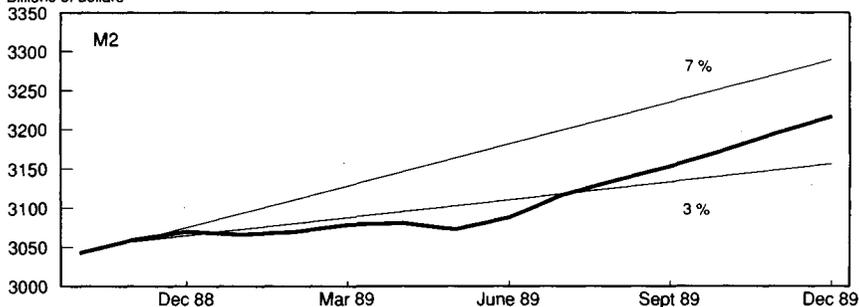
GROWTH OF GNP AND COMPONENTS

The more moderate expansion of real GNP between the fourth quarter of 1988 and the fourth quarter of 1989 reflected slower growth of interest-sensitive sectors (consumption of durables and residential investment) and of government purchases. In addition, increased national saving contributed to further improvements in net exports and continued growth of business investment even in the face of higher interest rates. These tendencies represent continued progress toward increased national saving and investment, better balance between domestic spending and domestic production, and a foundation for improved performance in the 1990s.

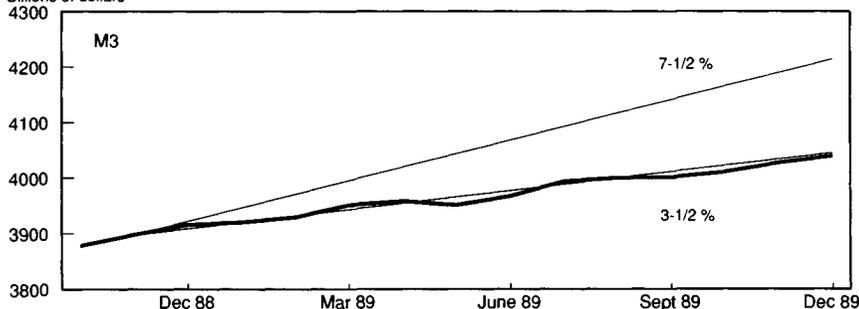
Chart 2-5

M2 AND M3. While M2 finished the year within its target range, M3 was slightly below at the end of 1989.

Billions of dollars



Billions of dollars



Source: Board of Governors of the Federal Reserve System.

Consumption and Saving

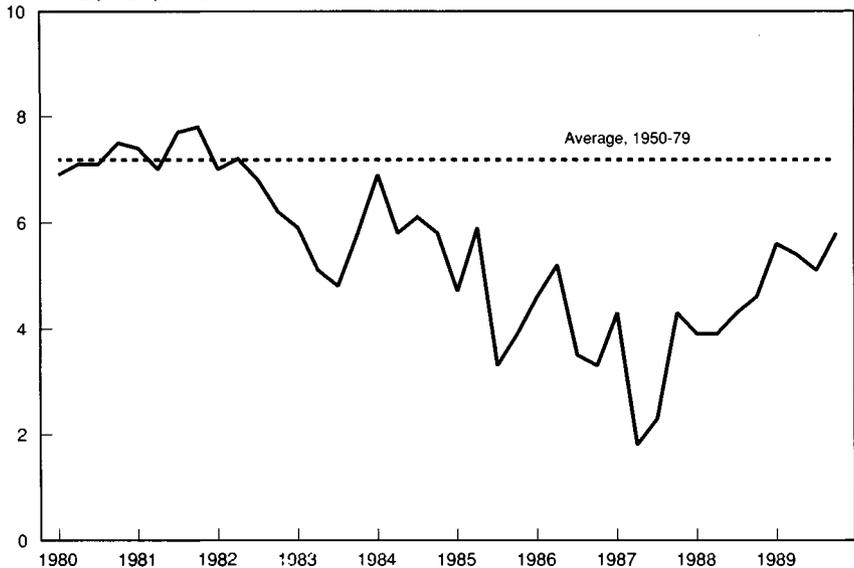
Because consumption expenditures constitute about two-thirds of GNP, changes in consumption are important influences on GNP growth. The growth of real personal consumption expenditures slowed to a 2.3-percent pace in 1989, down from 3.8 percent in 1988 (Table 2-1). Growth in real personal disposable income was 3.6 percent in 1989, close to the 4.0-percent pace of 1988. Consequently, the less rapid rise in personal outlays was reflected as an increase in the saving rate compared to 1988. As Chart 2-6 shows, the personal saving rate moved up to 5.5 percent in 1989, substantially above its 1987 low of 3.2 percent. Nevertheless, it remained considerably lower than its 7.2-percent average for the 1950-79 period.

The slower growth of overall consumption purchases reflected continued strength in expenditures on services but weaker growth in purchases of durable and nondurable goods. Among services, real purchases of medical care continued to increase at a particularly strong pace. The weakness in purchases of durables largely reflected sluggish automobile sales. Over the first two quarters of the year, real spending on motor vehicles and parts fell below the average pace for 1988. In the third quarter, auto sales jumped,

Chart 2-6

PERSONAL SAVING RATE. The personal saving rate rose above its 1987 low but remained below its historical average.

Percent of disposable personal income



Note: Data are quarterly.
Source: Department of Commerce

owing to the sales incentive programs introduced toward the end of the 1989 model year. In the fourth quarter, auto sales slumped again. For the year as a whole, auto sales fell from about 10.6 million units in 1988 to about 9.9 million units in 1989—the slowest rate since 1983.

Residential Investment

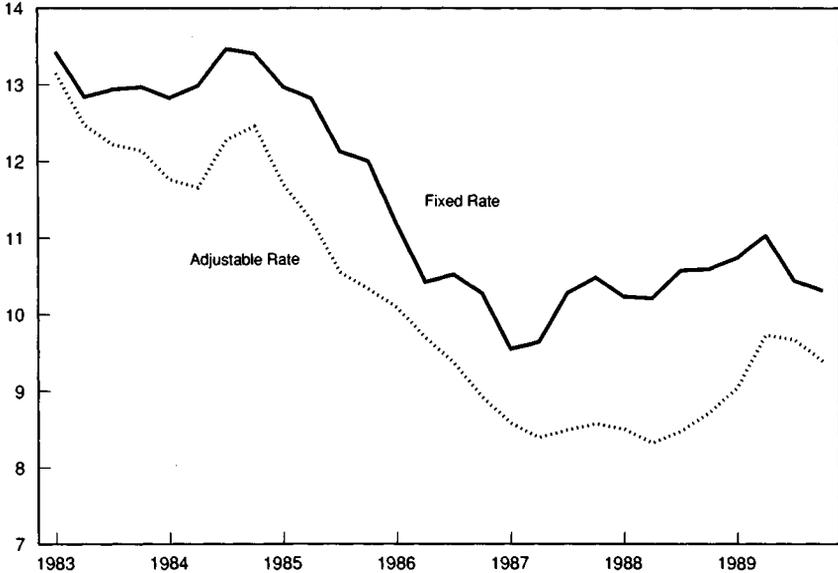
Housing investment declined in 1989 as higher mortgage interest rates reduced demand. As Chart 2-7 shows, rates on adjustable-rate mortgages rose from around 8.25 percent in April 1988 to about 10 percent by June 1989 before easing over the rest of the year. Yields on fixed-rate mortgages rose less, but nonetheless in 1989 averaged nearly 1 percentage point above their levels in 1987. Sales of existing single-family homes were 3.43 million units in 1989, compared with 3.59 million units the previous year. Likewise, sales of new single-family homes declined by 3.8 percent from 1988 to 1989. In response to lower sales, housing starts tumbled from a recent peak of 1.81 million units in 1986 to about 1.37 million units in 1989, the lowest rate since 1982. Similarly, expenditures on real residential

investment in the NIPA fell 6.1 percent from the fourth quarter of 1988 to the fourth quarter of 1989.

Chart 2-7

MORTGAGE INTEREST RATES. Mortgage interest rates rose in 1988 and early 1989, reducing housing demand; rates fell starting in the spring of 1989.

Percent per annum



Note: Data are quarterly effective rates.
Source: Federal Housing Finance Board.

Nonresidential Fixed Investment

Nonresidential fixed investment—investment by firms in structures and equipment—is an important determinant of economic performance. Over the business cycle, it is among the most volatile components of spending. Over longer periods, it is a critical input to economic growth. Real nonresidential fixed investment rose a solid 4.3 percent in 1989. The increase was spurred by the relatively high levels of capacity utilization and the need for firms to enhance their productivity in an increasingly competitive world economy. A Department of Commerce survey suggests that gains in investment spending during 1989 were widespread, with particularly strong gains occurring in nondurable goods manufacturing and in nonmanufacturing industries.

The rise in fixed investment was entirely in equipment rather than in structures. Computer purchases were particularly robust, rebounding from a lull late in 1988. Spending on most categories of structures was weak. Construction earlier in the 1980s may have been boosted by accelerated depreciation allowances, which were

reduced by the Tax Reform Act of 1986. In addition, while energy prices rose temporarily during late 1988 and early 1989, lower average energy prices since the mid-1980s have contributed to the sluggishness in oil and gas well drilling.

Inventory Investment

Like nonresidential fixed investment, inventories are an important contributor to the cyclical behavior of the economy. Since the mid-1980s, inventory-sales ratios have declined, owing at least in part to improved inventory management techniques, and at the end of 1989 the inventory-sales ratio remained close to the level of the previous 2 years (Chart 2-8). From a macroeconomic perspective, these lower ratios are welcome because they reduce the risk of widespread inventory imbalances, which in the past have often been associated with recessions.

Chart 2-8

REAL INVENTORY-SALES RATIO. During most of the 1980s the inventory-sales ratio for the nonfarm business sector declined.

Ratio

3.2



Note: Data are quarterly.

Source: Department of Commerce.

In 1989, increased real inventory investment contributed \$14.3 billion to growth in real GNP on a fourth-quarter-to-fourth-quarter basis. Inventories in the farm sector fell at an annual rate of \$13.6 billion in the fourth quarter of 1988, but rose \$1.3 billion in the fourth quarter of 1989. The swing in accumulation of farm inventories thus contributed \$14.9 billion to GNP growth.

The pace of nonfarm inventory investment in the fourth quarter was below the level in the fourth quarter of 1988, but picked up appreciably from the pace in the third quarter. Nonfarm inventories increased \$31.3 billion in the fourth quarter, up from \$16.2 billion in the third quarter. The swing in inventory accumulation largely reflected developments in the auto sector, which experienced sluggish demand in 1989.

Government Purchases

Federal, State, and local government purchases of goods and services, which account for close to 20 percent of GNP, were essentially flat in real terms in 1989. A moderate, 2.5-percent increase in purchases by State and local units offset a 3.0-percent decline by the Federal Government. As discussed above, the reduction in real Federal purchases was a result of the effort to reduce the Federal budget deficit.

Exports and Imports

The shortage of national saving relative to investment has been a fundamental source of the large trade deficit of the United States in recent years. (This topic is discussed in Chapter 4 of this *Report*.) The difference between U.S. imports and exports in real terms—the measure of the trade gap most relevant for explaining growth of real output—declined substantially in the first quarter of 1989 and remained roughly flat thereafter. In part, these improvements reflected the continued, lagged effects of the decline in the foreign exchange value of the dollar between 1985 and 1987. This dollar depreciation tended to reduce the price of U.S. exports on world markets and to increase the domestic price of imports. It thus boosted demand for exports and restrained demand for imports. In addition, U.S. firms had responded to difficult business conditions during the mid-1980s, when the dollar was quite strong, by taking steps to boost productivity and control costs. The cumulative effect of these measures by the end of the decade was to strengthen the competitive position of U.S. firms in world markets. Strong growth in production and incomes in foreign industrial countries also contributed to the demand for U.S. exports and the reduced trade deficit. (See Box 2-1 for a discussion of recent economic performance in other industrial economies.) In addition, slower growth of domestic demand in the United States probably restrained imports.

Real U.S. exports of merchandise and services reached an all-time high during 1989, and the United States regained its position as the world's leading exporter. The deficit on net exports in 1982 dollars totaled \$56.3 billion for the year—less than one-half the level of \$129.7 billion reached in 1986. In the second half of 1989, though, there were signs that the pace of improvement of the U.S. external balance was not continuing.

Box 2-1.—International Comparisons of Economic Performance

U.S. economic performance compares favorably with that of other industrial countries. The table below presents an economic summary for the United States and six other industrialized countries (collectively known as the Group of Seven, or G-7). The United States has had relatively low consumer inflation rates (as measured by the CPI) and excellent growth of industrial production, gross domestic product (GDP), and employment. Indeed, during the current expansion, the United States has generated more new employment than Canada, Japan, and Western Europe combined.

Recently, U.S. unemployment and inflation rates were again low by international standards, and real GDP per capita remained the highest in the G-7.

Economic Performance in the United States and other G-7 Nations

	CPI	Industrial production	GDP	Employment	1989 unemployment rate ¹	1989 inflation rate ²	1989 real GDP per capita ³
	Average annual percent change, 1982-88				Percent		
Canada	4.4	5.9	4.3	2.4	7.6	5.1	16,551
France	5.2	1.4	1.9	-1	10.1	3.8	12,490
West Germany	1.5	2.3	2.3	3	5.5	3.0	19,004
Italy	8.2	2.4	2.7	5	7.7	6.5	11,950
Japan	1.3	4.7	4.2	1.1	4.3	4.5	13,504
United Kingdom	4.7	3.1	3.3	1.8	5.9	7.7	12,717
United States	1.5	4.9	4.2	2.4	5.3	4.6	17,643

¹ Civilian unemployment rate, fourth quarter

² Percent change in CPI, December 1988 to December 1987

³ 1985 U.S. dollars

⁴ Third quarter data

⁵ Percent change in GDP, November 1988 to November 1987

Sources: Department of Commerce (Bureau of Economic Analysis and International Trade Administration), Department of Labor (Bureau of Labor Statistics), Organization for Economic Cooperation and Development, and Council of Economic Advisors.

The nominal net export deficit fell to \$50.9 billion in 1989, down from deficits of \$112.6 billion in 1987 and \$73.7 billion in 1988. Another broad measure of external imbalances, known as the current account deficit, averaged \$113.5 billion at an annual rate over the first three quarters of 1989, compared with totals of \$143.7 billion in 1987 and \$126.5 billion in 1988.

BUSINESS CONDITIONS

Production and employment increased at a good pace in 1989 and capacity utilization remained high. In addition, the farm sector recovered from the effects of the drought in 1988. Nevertheless, profitability softened somewhat and productivity growth slowed.

Profits

Before-tax profits of nonfinancial corporations declined from \$233.4 billion in 1988 to \$225.8 billion at an annual rate over the first three quarters of 1989. The decline in profitability reflected a smaller rise in prices per unit of output than in costs per unit of output. Price increases may have been restrained in part by the strength in the foreign exchange value of the dollar, and costs were boosted as labor productivity rose somewhat less rapidly than in 1988. The manufacturing sector accounted for much of the weakness in nonfinancial corporate profitability. Profitability of auto manufacturers was particularly low, with losses in the second and third quarters. In the financial sector, profits in 1989 were hurt by the effects of natural disasters on insurance company balance sheets.

Productivity

Productivity in the nonfarm private business sector continued to increase in 1989, likely reflecting continued capital investments by firms. The 0.8-percent annual rate of increase over the first three quarters, however, was somewhat lower than over the previous several years. To some extent this reflects the more moderate pace of output growth in 1989 compared with the previous 2 years. Many firms take a long-run view and are reluctant to release skilled workers as economic growth slows. This labor "hoarding" produces smaller increases in output per hour. Productivity increases in the manufacturing sector, at an average annual rate of 2.4 percent over the first three quarters, were stronger than in the overall nonfarm sector, but also were somewhat weaker than in previous years.

Industrial Production and Capacity Utilization

The industrial sector is a bellwether of the economy and accounts for roughly one-fifth of civilian employment. In 1987 and 1988, overall production of manufacturing, mining, and utility firms expanded at an average annual rate of 5.4 percent. Expansion of industrial production slowed to 1.7 percent in 1989, partly owing to the less rapid expansion of the overall economy. Another major factor influencing industrial production in the second half of the year was the slower rate of improvement of the U.S. external balance, since many U.S.-manufactured goods are sold on international markets.

The slower pace of industrial production combined with expansion of productive capacity to reduce rates of capacity utilization in 1989. Overall, the Federal Reserve's measure of capacity utilization declined from its peak of 84.3 percent in January 1989 to 83.3 percent by December. Some industries showed larger reductions. For example, operating rates for iron and steel mills, which reached a

peak of 92.8 percent in October 1988, had fallen 14.3 percentage points by November 1989—probably influenced in part by the slowdown in auto manufacturing. Production in many industries such as paper, chemicals, rubber, and nonelectrical machinery (which includes computers) held steady or increased. But in a number of these industries, firms added capacity even more rapidly, leading to reduced operating rates.

The Farm Economy

While employing a relatively small fraction of the labor force, the agricultural sector plays a vital role in the economy. Early in the 1980s, the U.S. farm economy faced serious economic problems, but the resurgence of the farm sector since the mid-1980s is providing a sound foundation for the next decade.

The 1989 crop year was generally good, even though inadequate rainfall in some areas held crop yields somewhat below trend. Overall production of major commodities was up substantially from the low levels of the previous year, and net farm income reached a record \$48 billion, up 12 percent from 1988. Land values—the major component of the farm balance sheet—increased for the third consecutive year, up 7 percent from 1988.

Farm prices for major crops declined from the peak levels reached after the 1988 drought, but remained high relative to the previous several years. Livestock prices stayed firm during the year. Higher crop prices reduce government payments to farmers. These payments—boosted by drought-relief payments—remained high by historical standards, but fell by 24 percent from 1988. Direct payments to farmers were about \$11 billion, or about 6 percent of gross farm income.

Farm trade also improved. Agricultural exports in fiscal 1989 totaled about 148 million tons, were valued at \$40 billion, and contributed to an agricultural trade surplus of \$18 billion. In fiscal 1986, exports were only 110 million tons, with a value of \$26 billion. U.S. market shares of world agricultural trade in fiscal 1990 are projected at 36 percent for wheat and 64 percent for coarse grains, down slightly for wheat from the previous year and about the same for coarse grains. In both cases, shares are substantially higher than in the mid-1980s.

Employment

Expanding production was accompanied by rising employment levels and a low unemployment rate. Between December 1988 and December 1989, nearly 2.5 million employees were added to non-agricultural payrolls. Most of this increase, 2.1 million workers, was on private payrolls.

As mentioned above, output of services grew strongly in 1989, and employment increases totaling about 1.2 million mirrored this

growth. Employment also rose in wholesale trade, retail trade, and construction. But manufacturing employment was stagnant, reflecting the weak growth of production.

As noted above, the civilian unemployment rate averaged 5.3 percent, its lowest since 1973. Unemployment rates improved for most major demographic groups, including blacks, women, and teenagers. The 1989 rate for blacks (11.4 percent) was the lowest since 1974, while that of Hispanics (8.0 percent) was the lowest since the series began in 1980. During the 1980s, the gap between adult male and adult female unemployment rates essentially vanished. In addition, the unemployment rate for teenagers was the lowest since 1973.

For those who became unemployed, the median duration of unemployment was 4.8 weeks compared to 10.1 weeks in 1983, when the demand for labor was relatively weak in the wake of the recession. The proportion of unemployed persons who lost their jobs rather than left voluntarily was 45.7 percent compared with 58.7 percent in 1982.

WAGES AND PRICES

Relatively low unemployment rates implied firm labor market conditions in 1989. Wage increases were quite low in 1986 and 1987, partly because of the temporarily low level of inflation. Increases in labor compensation in 1988 and 1989 were above the lows of 1986 and 1987. Boosted by an increase in Social Security tax rates, the employment cost index of labor compensation rose 4.9 percent over 1988, and a slightly lower 4.8 percent over 1989.

Labor compensation costs consist of wages and salaries and benefits. Benefits include items such as employers' health, disability, and life insurance contributions; contributions to Social Security and retirement plans; and compensation paid during vacations. The increase in the wages and salaries component of the employment cost index rose moderately from 3.1 percent in 1986 to 4.2 percent in 1989. The increase in benefit costs rose more sharply, from 3.4 percent in 1986 to 6.8 percent in 1988, and declined slightly to 6.1 percent for 1989. Nearly all of the acceleration in benefit costs can be traced to rising health insurance premiums.

Inflation remained moderate in 1989. The "core" CPI—a measure that excludes volatile food and energy prices—rose 4.4 percent, compared with 4.7 percent in 1988. (The CPI is a broad measure of the cost of a market basket of goods and services purchased by a typical urban consumer.) Within the CPI, costs of medical care increased sharply. Prices for shelter—a major part of household budgets—rose more moderately, as did apparel prices.

Consumer food and energy prices rose sharply over the early part of the year, owing to the 1988 drought and to higher oil prices.

Over the first 6 months of 1989, consumer prices for gasoline rose at an annual rate of about 44 percent. Later in the year the situation in agricultural and energy markets improved considerably. From July to December, consumer gasoline prices fell 21 percent. Including food and energy prices, the CPI increased 4.6 percent, essentially the same as the pace in 1988.

Movements in the finished goods producer price index—a measure of the costs of domestic goods used as inputs by businesses—were also dominated by developments in food and energy markets. During the first quarter, prices of finished foods jumped 13.1 percent at an annual rate, following a 5.7-percent rise during 1988. These striking increases stemmed mainly from even larger 14.2-percent increases in food prices at the crude materials level during 1988 and 16.9-percent increases during the first quarter of 1989, as the severe drought during 1988 curtailed food supplies. Over the following two quarters, however, prices of crude food materials declined steeply as a rebound in farm production began to show through in market prices, and finished consumer food prices declined in response.

Producer prices for finished energy products rose 36.3 percent at an annual rate over the first half of 1989. This increase stemmed in part from a reduction in production by the Organization of Petroleum Exporting Countries; from disruptions of production and distribution caused by the oil spill in Alaska, a refinery fire in California, and an accident on a North Sea oil rig; and from rising world demand. These events led crude oil prices to rise at an annual rate of 33 percent between January and June. Between June and December, however, producers' finished energy prices declined 12.1 percent at an annual rate, reflecting a 13.9-percent fall in crude prices.

SUMMARY OF 1989

The economy's continued expansion in 1989 set the stage for sound economic performance in the 1990s.

- Real GNP grew for the seventh straight year in 1989, and inflation remained under control.
- Nearly 2.5 million jobs were created, and the unemployment rate was at its lowest level since 1973.
- Fiscal policy during 1989 reflected efforts to reduce the Federal budget deficit. The trend toward slower growth of real Federal spending continued, and was bolstered by the sequester during the fourth quarter.
- After tightening early in 1989, monetary policy eased over the second half of the year in response to signs of sluggish growth and lower inflation.

- The composition of GNP growth was favorable, with less rapid increases in consumption and government spending, maintained growth of investment spending, and continued improvement in external balances.
- Economic conditions varied somewhat by sector. While the manufacturing sector experienced a slowdown, the farm economy maintained steady improvement and services continued to boom.

THE ECONOMIC OUTLOOK

The U.S. economy is expected to grow at a sustainable pace through 1990, and over the long run the potential for solid growth remains excellent. Assessments of the future inevitably rely heavily on historical experience, and a casual reading of the postwar experience may suggest that the very length of the current expansion implies that it must come to a close. A closer look at the historical record, however, shows that an economic expansion does not come with an expiration date.

WHY THE EXPANSION IS EXPECTED TO CONTINUE

Studies show that as an expansion continues, a recession does not automatically become more likely. Put differently, the probability of a recession starting during any given month does not rise as the period of expansion lengthens.

In the postwar period, rapidly accelerating inflation has often preceded economic downturns. When inflation becomes intolerable, politically or economically, there is little choice but to tighten monetary policy, which typically brings on a recession. Inflation accelerated in the years before the longest expansion in U.S. history ended in the 1970 recession. Inflation also accelerated before the 1974-75 recession. In the late 1970s, inflation rose to 14 percent over the 12 months immediately prior to the back-to-back recessions in the early 1980s. High inflation is not only bad *per se*, but can be very costly to reduce. Avoiding an acceleration of inflation, such as that which led to the recessions of 1981 and 1982, is an essential element of sound economic policy.

In marked contrast to all other expansions in postwar U.S. history, inflation in the current expansion has remained moderate and has not accelerated. The costs of relatively steady inflation around 4 percent are far below those imposed by the inflation of a decade ago, which averaged 9.6 percent, fluctuated widely, and reached a monthly peak of 18.6 percent. Nonetheless, the lower the inflation rate, the smaller is the risk of inflation rising to unacceptable levels. Hence, over the long run, further progress toward price sta-

bility is desirable. The containment of inflation is a key factor in the Administration forecast for continued expansion in the 1990s.

The economy is inevitably subjected to a variety of unanticipated events such as changes in foreign demand, rapid swings in financial markets, or abrupt movements in oil prices. However, these events may have less effect on economic activity today than in the past. The service industry is typically less susceptible to such shocks, and services have grown in importance in the U.S. economy. In addition, U.S. industry has moved to a lower inventory-sales ratio, a move that lessens the likelihood that a large inventory overhang will transform shocks into a sustained downturn. Finally, deregulation in areas such as energy markets has raised the potential to produce, but may also reduce the impact of shocks on the U.S. economy by permitting markets to reallocate economic activity more swiftly.

A final factor in ending expansions has been errors in economic policy. Because policy operates with a lag and the economy is hard to forecast, some misjudgments are unavoidable. The Administration's principle of systematic and credible fiscal and monetary policies is designed to minimize these policy mistakes by not changing policy frequently on the basis of the economic conditions of the moment or any short-run forecast. To do so would invite and perhaps guarantee costly errors. Instead, the goal of policy is to provide a stable environment that will foster strong economic performance over the long haul.

THE OUTLOOK FOR FISCAL AND MONETARY POLICIES

The Administration's primary economic policy goal is to promote further growth. Containing and eventually reducing inflation is key to achieving this goal. It is not sufficient merely to avoid a recession. Administration policies seek to remove impediments to more rapid growth. Faster growth carries with it expanded employment opportunities, an improved atmosphere for the creation of new business, and the means for society both to meet its obligations in the present and to provide for future generations.

Fiscal Policy

The projections presented below are contingent upon the successful implementation of the President's proposed policies. Economic growth will continue to raise Federal receipts and lower the budget deficit. However, it is essential that continued restraint on the growth of Federal spending permit the deficit to decline, leading to a balanced budget in fiscal 1993 and to a reduction in the national debt thereafter. In the near term, the Administration expects real Federal purchases of goods and services to fall by 2.7 percent in calendar 1990 (Table 2-2). Purchases of both defense and nondefense goods and services are expected to drop by roughly the same percentage amount.

conomic growth will continue to raise Federal receipts and narrow the budget deficit.

TABLE 2-2.—*Economic Outlook for 1990*

	1989 ¹	1990 Forecast
	Percent change, fourth quarter to fourth quarter	
Real gross national product.....	2.4	2.6
Personal consumption expenditures	2.3	2.4
Nonresidential fixed investment	4.3	4.2
Residential investment.....	-6.1	5.1
Federal purchases of goods and services.....	-3.0	-2.7
State and local purchases of goods and services.....	2.5	2.0
GNP implicit price deflator	3.8	4.2
Consumer price index ²	4.5	4.1
Compensation per hour ³	5.5	5.8
Output per hour ³	0.7	1.6
	Fourth quarter level	
Unemployment rate (percent) ⁴	5.3	5.4
Housing starts (millions of units, annual rate).....	1.3	1.5

¹ Preliminary

² For urban wage earners and clerical workers.

³ Nonfarm business, all persons.

⁴ Unemployed as percent of labor force including resident Armed Forces.

Note.— Based on seasonally adjusted data.

Sources: Council of Economic Advisers, Department of the Treasury, and Office of Management and Budget.

Recent developments in the Soviet Union and Eastern Europe have led some to conclude that it will be possible to spend far less on national defense. It is difficult to ascertain the potential size of such a “peace dividend” at this time. Real spending for national defense has already fallen 4.5 percent over the past 2 years. The Administration’s fiscal 1991 budget projects that real defense spending will decline by 12.5 percent between fiscal 1989 and fiscal 1993. The President has already proposed reductions of \$64 billion in budget authority and \$29 billion in outlays over the next 3 years, relative to previously approved levels. Any further reduction can come only after a careful evaluation of the impact of current political events on our national security. If world events, negotiations for troop reductions, and progress in limiting strategic weapons permit, the size of the peace dividend could become substantially larger over time. Regardless of its size, any such peace dividend should be used wisely and with careful consideration of the Nation’s domestic and foreign policy priorities. It should not be used to fuel large increases in entitlement programs, as occurred after the war in Vietnam. The President has made clear that the first priority use of any peace dividend is to reduce the Federal budget deficit.

In the longer term, it is desirable to do more than just reduce deficits. The Administration’s proposed Social Security Integrity and Debt Reduction Fund is designed to guarantee that future consolidated annual Federal budget surpluses will not be used to in-

crease government spending, but instead will be dedicated to reducing the national debt. Moving away from deficits toward Federal saving will raise the low rate of national saving, lower interest rates, and increase capital formation. A credible commitment to reduced Federal borrowing will hasten the reduction in interest rates and the increase in investment.

Monetary Policy

The outlook for the economy depends in part on recent and projected monetary policy. Over the second half of 1989, the Federal Reserve eased the stance of monetary policy in view of signs of slower economic growth and reduced inflationary pressures. The lower interest rates that resulted from this easing should help to cushion the slowing in spending that became evident in 1989.

In July, the Federal Reserve announced provisional target ranges for growth during 1990 of 3 to 7 percent for M2, 3½ to 7½ percent for M3, and 6½ to 10½ percent for domestic nonfinancial sector debt. These provisional ranges are identical to the ranges for 1989. The Federal Reserve noted that, in view of various economic and financial uncertainties, it was unsure whether the velocities of M2 and M3—the ratios of GNP to these aggregates—were more likely to rise or fall in 1990. The Federal Open Market Committee (FOMC) will review these provisional ranges, and is expected to announce its decisions on the 1990 ranges in February 1990.

The FOMC will need to consider several factors. First, the Federal Reserve regards reasonably stable prices as a prerequisite to achieving its goal of maximum sustainable economic growth. Long-run price stability will require that the targets for money growth be gradually reduced in future years.

Second, short-run velocity developments are likely to differ considerably from the longer run trends. Given the substantial declines in market interest rates over 1989 and the associated fall in the opportunity cost of holding money balances, M2 velocity is likely to decline substantially into 1990. If, as the Administration is forecasting, interest rates drop further this year the decline in velocity may be accentuated, thereby requiring higher M2 growth to achieve the expected growth in nominal GNP. For M3 velocity, these interest rate effects could be offset somewhat by a reduction in managed liabilities in the thrift sector, as insolvent institutions are closed by regulators, and if other thrifts continue to expand their balance sheets slowly in order to comply with new capital requirements.

The forecast of expected nominal GNP growth of about 7.0 percent, expected lower interest rates, and any such decline in M2 velocity implies that M2 could exceed its provisional target range in 1990. If developments since July suggest that a significant decline in M2 velocity is likely in 1990, the FOMC could choose to raise its

target range. It may be reluctant to do this, however, because it may lead to misperceptions of the Federal Reserve's long-run intentions with regard to money growth and price stability. If the FOMC leaves the range unchanged, but economic and financial conditions develop according to the Administration's forecast, the higher demand for money could lead the FOMC to allow M2 to exceed its target range during 1990; if so, growth in the money stock should be slower in succeeding years as velocity returns to its long-run average. The Federal Reserve Act does not require the Federal Reserve to keep money growth within a year's target ranges if changing circumstances lead it to conclude that doing so is undesirable. In such a case, the Federal Reserve would be required to explain the reasons for its determination.

In any event, the Administration anticipates that monetary policy will continue to support economic growth with progress toward reduced inflation. The Administration's program to reduce deficits and raise government saving will complement the Federal Reserve's efforts by fostering lower real interest rates, which will help maintain economic growth while progress is made toward price stability.

THE PROSPECTS FOR GROWTH

The Administration's projections call for continued healthy economic growth and high levels of resource utilization, with inflation low and declining in later years. Economic policies and developments during 1989, particularly the containment of inflation, have set the stage for continued strong growth.

The Outlook for 1990

The Administration anticipates a 2.6-percent increase in real GNP from the fourth quarter of 1989 to the fourth quarter of 1990, somewhat faster than the drought-adjusted 1.9-percent increase in 1989 (Table 2-2). The transition from 1989 to 1990 has been affected by a number of disruptive events. During September, Hurricane Hugo battered South Carolina and in October the Loma Prieta earthquake struck northern California. In addition, the second longest strike in the history of The Boeing Company halted work from October 4 to November 22. Exceptionally cold weather in December may also have reduced economic activity.

On balance, these events temporarily slowed growth, with estimates indicating that the Boeing strike alone subtracted nearly one-half percentage point from fourth-quarter growth in real GNP. The return of production to normal levels will temporarily raise GNP growth in the first quarter of 1990. In addition, the rebuilding of both government and private structures in the aftermath of the disasters may spill over into 1990 and increase the level of GNP.

These effects notwithstanding, growth is expected to be relatively slow early in 1990 and then is expected to gain momentum later in the year. In the past, there have been several times when the economy slowed, then picked up and continued to grow for a substantial time; examples include 1966-67 and 1985-86.

The lagged effects of tight monetary policy early in 1989 are expected to spill over into the first half of 1990. But interest rates have been declining since the spring of 1989 and are anticipated to decline further. This decline is expected to contribute to the pickup in economic growth in 1990. As a result, the consumer durables and residential construction sectors are projected to rebound from weak patterns at the end of 1989. Fiscal restraint, in response to the need for deficit reduction, and a slowing in the increase of real net exports will tend to moderate growth in 1990.

The projected rate of increase of real consumer purchases from the fourth quarter of 1989 to the fourth quarter of 1990 is 2.4 percent (Table 2-2). Inflation for consumer purchases was lower in the second half of 1989, and increases in personal income have been strong. These factors are expected to support growth in consumer demand in 1990.

The projection calls for a 5.1-percent increase in residential investment in 1990, following a 6.1-percent decline in 1989. The decline of mortgage interest rates in the second half of 1989 has increased housing affordability. Further declines in interest rates and a rebound from slow housing production in 1989 are expected to stimulate housing construction in 1990. Housing starts are projected to average 1.5 million units at an annual rate by the fourth quarter of 1990.

The growth of nonresidential fixed investment spending in 1990 is expected to be about the same as the pace of 1989. Capacity utilization rates are anticipated to remain relatively high and the need for further capacity will continue to stimulate growth in investment, particularly for equipment. While still high, however, utilization rates fell during 1989. This fall, coupled with weak corporate profits in 1989, is expected to have a damping effect on the demand for capital goods. As Table 2-2 shows, real nonresidential fixed investment is expected to grow 4.2 percent in 1990, compared with 4.3 percent in 1989.

Inventory investment, after contributing to real GNP growth in 1989, is not expected to add to growth in 1990. The contribution in 1989 was driven mainly by a replenishment of farm stocks following the drought and partly by accumulation of inventories in the fourth quarter, particularly for motor vehicles. Farm inventory investment is expected to be much more modest in 1990. Furthermore, slower production aimed at reducing a fourth-quarter nonfarm inventory buildup is expected to contribute to modest growth in

early 1990. By year end, nonfarm inventory accumulation may still be below levels at the end of 1989.

State and local government purchases of goods and services are projected to increase 2.0 percent in 1990, somewhat slower than the pace of 1989. As discussed above, real Federal purchases of goods and services are projected to decline in 1990, reflecting a continued commitment to deficit reduction.

As in 1989, improvements in real net exports are expected to be smaller and more gradual over the near term, relative to the strong gains in 1987 and 1988. After falling for several years, the foreign exchange value of the dollar has increased slightly over the last year, and the growth rate of economies abroad is expected to decline modestly over the near term. Nevertheless, as the result of improved U.S. competitiveness in world markets since 1985, net exports are expected to continue to contribute to real GNP growth.

The CPI is projected to increase 4.1 percent between the fourth quarter of 1989 and the fourth quarter of 1990, while the GNP deflator is projected to increase 4.2 percent. These rates are similar to rates of inflation in recent years, excluding food and energy. In line with moderate real growth, little change is expected in the rate of capacity utilization and the rate of unemployment. This will reduce upward pressure on prices caused by sectoral capacity bottlenecks and tightening labor markets. Sharply rising and then falling prices for energy and food helped explain much of the acceleration and deceleration in inflation in 1989. Increases in these prices are expected to be modest over the near term.

Economic projections are, of course, characterized by uncertainty. The Administration was fortunate that its first official forecast (that accompanying the 1989 Mid-Session Review of the Budget) was quite accurate for 1989. Nevertheless, it must be emphasized that forecasting is an imprecise science. Unanticipated events with economic consequences, such as the hurricane and earthquake in 1989, occur from time to time. In addition, the reactions of businesses and households to changes in economic conditions or policies may shift over time. Thus, the current forecast inevitably involves uncertainties. For example, business investment, housing demand, and the improvement in international trade may be weaker than is currently projected. On the other hand, consumption growth could be stronger in 1990.

Such uncertainties are illustrated in the alternative projections presented in Table 2-3. The alternatives show somewhat stronger and somewhat weaker real growth, each with plausible associated paths for unemployment, inflation, and interest rates. Real growth in the lower path in 1990 is similar to the slowdown in 1986. The higher path shows real growth improving from the slow rate of 1989 to the faster pace of 1987 and 1988.

TABLE 2-3.—*Effects of Alternative Projections on the Budget*

	Calendar Year 1990 ¹	Calendar Year 1991 ¹
	Percent change, fourth quarter to fourth quarter	
Real gross national product:		
Higher growth	3.0	3.4
Administration	2.6	3.3
Lower growth	1.9	3.0
GNP deflator:		
Higher growth	4.4	4.3
Administration	4.2	4.1
Lower growth	4.0	4.1
	Percent	
Total unemployment rate:		
Higher growth	5.1	5.0
Administration	5.4	5.3
Lower growth	5.6	5.4
Interest rate, 91-day Treasury bills:		
Higher growth	6.9	5.7
Administration	6.7	5.4
Lower growth	6.5	5.5
	Billions of dollars	
Budget deficit:		
Higher growth	118.5	54.6
Administration	123.8	63.1
Lower growth	129.1	77.5

¹ Deficit is for fiscal year.

Sources: Council of Economic Advisers, Department of the Treasury, and Office of Management and Budget.

The evolution of the budget deficit is significantly affected by economic conditions. Hence, uncertainty in the economic forecast leads to uncertainty in the budget projections. The impact of each alternative path for economic conditions on the budget deficit is also shown in the table. The cumulative effect by fiscal 1991 ranges from a \$14.4 billion increase in the deficit for the lower growth alternative to an \$8.5 billion reduction under the higher growth alternative.

The Outlook Through 1995

Table 2-4 summarizes the Administration's medium-term economic projections through 1995. As the table shows, GNP growth between 1991 and 1993 is projected to be above 3 percent as the economy moves toward full utilization of its resources. Thereafter, the growth rate is expected to stabilize at around 3.0 percent, roughly equal to the economy's projected growth potential. Real compensation per hour is projected to rise in line with productivity growth at a rate of 1.8 percent per year. Inflation (as measured by the CPI) and interest rates on 91-day Treasury bills are projected to decline gradually from current levels, with real (inflation-adjusted) interest rates returning to levels closer to their historical averages.

These sustained declines in inflation and interest rates depend upon the Administration's systematic and credible macroeconomic policies, particularly those to eliminate the Federal budget deficit and then to reduce the national debt (Box 2-2).

TABLE 2-4.—Administration Economic Assumptions, 1989-95

	1989 ¹	1990	1991	1992	1993	1994	1995
	Percent change, fourth quarter to fourth quarter						
Real GNP.....	2.4	2.6	3.3	3.2	3.1	3.0	3.0
Real compensation per hour ².....	.9	1.7	1.9	1.8	1.8	1.8	1.8
Output per hour ².....	.7	1.6	1.9	1.8	1.8	1.8	1.8
Consumer price index ³	4.5	4.1	4.0	3.8	3.5	3.2	2.9
	Annual level						
Interest rate, 91-day Treasury bills (percent) ⁴	8.1	6.7	5.4	5.3	5.0	4.7	4.4
Employment (millions) ⁵	119.0	120.2	122.0	123.7	125.5	127.3	128.9
Unemployment rate (percent) ⁶	5.2	5.4	5.3	5.2	5.1	5.0	5.0

¹ Preliminary.

² Nonfarm business, all persons.

³ For urban wage earners and clerical workers.

⁴ Average rate on new issues within period, on a bank discount basis.

⁵ Includes resident Armed Forces.

⁶ Unemployed as percent of labor force including resident Armed Forces.

Sources: Council of Economic Advisers, Department of the Treasury, and Office of Management and Budget.

The U.S. economy begins the decade of the 1990s at relatively high levels of resource utilization. Thus, unlike earlier years in the expansion, growth cannot rely heavily on fuller utilization of existing resources. Instead, future growth in the economy depends upon growth of resources and improvements in the economy's ability to produce.

Growth in output is the result of growth in the work force and improvements in labor productivity. Productivity growth, in turn, follows from increases in the quality of the work force, advances in the quality and quantity of the capital stock, and technological progress.

Growth in the labor force is the result of growth in the population and increases in the rate of labor force participation. Following the passage of the baby-boom generation into adulthood, growth of the population aged 16 and over is projected to slow in the 1990s. Population growth from 1989 to 1995 is projected to average 0.9 percent per year, down from slightly over 1 percent in the 1980s and nearly 2 percent in the 1970s (Table 2-5).

The changing demographic composition of the population affects participation rates. Overall participation rates in the 1970s were raised by the strong upward trend in the involvement of women and teenagers in the labor force. Continued strong participation increases by women furthered the rise in overall participation in the 1980s. Growth in the participation rate for women is projected to

Box 2-2.—Policy Credibility and the Economic Projections

Credible macroeconomic policies are a key to the Administration's projection of solid growth in the 1990s with gradually declining inflation. The success in containing inflation through 7 years of economic expansion has helped to build this credibility. The interest rate projections are influenced by the Administration's commitment to reducing the Federal budget deficit to zero in 1993 and dedicating projected future surpluses thereafter to reducing the national debt. The Federal Government's commitment to reduced borrowing in the future is expected to ease pressure on interest rates. Similarly, the Federal Reserve's continued commitment to move toward price stability is expected to help keep wage increases in line with productivity gains by reducing the expected inflation component of wage decisions.

There is no inconsistency in projecting continued low unemployment and declining rates of inflation. The idea that there is a simple, stable, and permanent tradeoff between inflation and unemployment does not accord with modern macroeconomic theory, which emphasizes the importance of expectations, or with historical experience. In the 1970s, inflation and unemployment were high, while in the 1980s, the opposite occurred—inflation and unemployment were relatively low. The United States and other economies are capable of sustaining growth, achieving low unemployment, *and* controlling and reducing inflation simultaneously. The notion that the *only* way to keep inflation in check is to run a slack economy with relatively high unemployment and excess capacity is incorrect.

The potential gains from credible policies are discussed more fully in Chapter 3.

slow somewhat in the 1990s, but this is expected to be offset by slower declines in the participation rates of older workers. As a result, growth of the overall participation rate is projected to average 0.4 percent per year through 1995, just below the average growth rate experienced since 1973.

The net effect of slower population growth and roughly unchanged growth in the rate of participation is slower expected growth of the labor force. Between 1989 and 1995, the projections show a 1.3-percent annual rate, down from 1.7 in the 1980s and 2.4 percent in the 1970s. With little anticipated change in the unemployment rate through 1995, employment is expected to grow at roughly the same rate as the labor force.

TABLE 2-5.—Accounting for Growth in Real GNP, 1948-95

[Average annual percent change]

	1948 IV to 1981 III	1973 IV to 1981 III	1981 III to 1989 III	1989 III to 1995 IV
GROWTH IN:				
1) Civilian noninstitutional population aged 16 and over.....	1.5	1.8	1.1	0.9
2) PLUS: Civilian labor force participation rate.....	.2	.5	.5	.4
3) EQUALS: Civilian labor force.....	1.8	2.4	1.7	1.3
4) PLUS: Civilian employment rate.....	-.1	-.4	.3	.0
5) EQUALS: Civilian employment.....	1.7	2.0	2.0	1.4
6) PLUS: Nonfarm business employment as a share of civilian employment.....	.1	.1	.3	.3
7) EQUALS: Nonfarm business employment.....	1.7	2.1	2.2	1.7
8) PLUS: Average weekly hours (nonfarm business sector).....	-.4	-.7	-.0	-.1
9) EQUALS: Hours of all persons (nonfarm business).....	1.3	1.4	2.2	1.6
10) PLUS: Output per hour (productivity, nonfarm business).....	2.0	.7	1.4	1.8
11) EQUALS: Nonfarm business output.....	3.3	2.0	3.7	3.4
12) LESS: Nonfarm business output as a share of real GNP.....	-.0	-.1	.6	.4
13) EQUALS: Real GNP.....	3.3	2.2	3.1	3.0

Note.—Time periods for the first two columns are from business cycle peak to business cycle peak to avoid cyclical effects. Sources: Council of Economic Advisers, Department of the Treasury, and Office of Management and Budget.

The productivity of each worker depends upon the skills generated by his or her training and experience, the technical sophistication of production, and the capital resources available to each worker. Following slow growth for most of the 1970s and early 1980s, productivity for the nonfarm business sector of the economy—which makes up four-fifths of GNP—is projected to increase at a 1.8-percent average annual rate through 1995. This rate is identical to growth during the years 1986-88, represents a rebound toward the 1.9-percent average for the period from 1948 through the third quarter of 1989, and contrasts with growth of only 0.7 percent for the 1970s and early 1980s.

Real investment spending has been strong from 1987 through 1989, contributing to an increase in the ratio of capital to labor, which will aid labor productivity. A stable, growing low-inflation economy provides a climate conducive to capital formation. Maintaining a low rate of inflation and low tax rates keeps the cost of capital low and the return to capital investments high. The accumulation of capital will also be aided by expected stable energy prices, which will allow firms to continue to focus on productivity-enhancing, rather than energy-conserving, capital equipment. Slower growth of the labor force and employment will also contribute to a higher capital-to-labor ratio.

Real GNP growth is expected to average 3.0 percent between 1989 and 1995. Despite expected slower growth of the labor force, continuing strong productivity growth is projected to contribute to output growth averaging 3.4 percent a year in the nonfarm business sector of the economy. Because growth is projected to be slower in the government and other sectors than in the nonfarm

business sector, total real GNP is expected to grow at a slightly slower rate.

SUMMARY OF THE OUTLOOK

- Administration policies and events are setting the stage for economic growth continuing in 1990 and later years. The containment of inflation in 1989 is a key factor in the Administration's forecast of continued expansion in 1990 and beyond. Periods of rapidly accelerating inflation are often followed by economic downturns.
- The goal for fiscal policy will be to continue to reduce government borrowing. Reduced deficits through 1993 and reduction of the national debt thereafter would contribute to lower interest rates, increased capital formation, and stronger growth.
- Monetary policy eased over the second half of 1989, lowering interest rates. Given the lags in the effects of monetary policy, this is likely to help some interest-sensitive sectors to rebound in 1990. Over the longer term, monetary growth is expected to be consistent with the Federal Reserve's goal of strong noninflationary growth.
- The Administration anticipates a 2.6-percent increase in real GNP in 1990, on a fourth-quarter-over-fourth-quarter basis, and lower inflation.
- Over the longer term, the Administration anticipates real growth in GNP at a rate of 3.0 percent per year, with continued progress in reducing inflation.

CONCLUDING COMMENTS

As the U.S. economy moves into the eighth year of growth, there is a strong basis for continued expansion in the 1990s. The Administration's goal is not simply to avoid recessions and extend the expansion. The goal is to sustain growth at a sufficiently strong pace to provide rising real incomes, expanding employment opportunities, and additional resources to address the needs and wants of the American people.

As described in detail in the next chapter, systematic and credible monetary and fiscal policies are essential for strong future growth and reduced inflation. The conduct of these policies should be governed by the goal of enhancing long-run performance, not by an exclusive focus on short-term outcomes, which would raise the likelihood of policy errors.