CHAPTER 3

The Economic Outlook

IN 1979 THE ECONOMY will enter its fifth consecutive year of economic growth, making this the second longest recovery in postwar history. As a recovery matures, sustaining a satisfactory pace of expansion becomes more difficult. Housing, in which starts have more than doubled since early 1975, is only one example. Given current demographic trends, a high level of starts is sustainable, but housing could not be expected to add much to growth even under the most favorable circumstances in financial markets. The saving rate has fallen to very low levels by historical standards, and the rise of consumption may consequently drop behind the growth of disposable income. In addition, business fixed investment in real terms has already regained its prerecession ratio to gross national product (GNP), and hence a slower growth of business capital expenditures is likely. All these factors will combine to check the pace of economic expansion next year.

As Chapter 2 makes clear, a reduction in economic growth from the rate of the last 2 years is needed both because idle labor and capital resources have been cut considerably and because inflation has accelerated. The task for aggregate demand policies will be to provide a climate in which inflationary pressures can begin moderating, but to avoid restraint so severe as to generate a recession.

THE ECONOMY IN 1979 AND 1980

Real growth is projected to average about 2¼ percent for the 4 quarters of 1979, a lower growth rate than in 1978 but positive throughout the year. If the anti-inflation program succeeds, as is anticipated, the rate of growth of consumer prices should slow to less than 7½ percent over the 4 quarters of 1979, and to an annual rate of slightly under 7 percent by the end of the year. According to initial indications, business and labor groups are taking the President's voluntary standards seriously, but success cannot yet be assured. Widespread compliance with the anti-inflation program is essential to maintenance of a strong and healthy economy.

In 1980, real growth is expected to rise to a rate of 3¼ percent over the 4 quarters, largely as a result of an upturn in housing, while inflation will continue to slow, dropping below 6½ percent. Here also success in the fight against inflation will contribute materially to sustaining economic growth by reducing the pressures on credit markets and strengthening confidence among consumers and businesses.

Employment is expected to rise by about 2 million a year in both 1979 and 1980. Productivity is expected to grow at about the same rate in 1979 as in 1978, with some improvement in 1980. It is likely to remain well below its trend rate of increase of about 1½ percent. With the labor force expected to continue growing at a rate above the long-term trend and real growth slowing, the unemployment rate is likely to increase to 6¼ percent by the end of 1979 and remain near that level in 1980.

FISCAL POLICY FOR 1979 AND 1980

The course of fiscal policy that is appropriate for 1979 and 1980 was described generally in Chapter 2. In specific terms, Federal outlays are projected to be $493 billion in fiscal 1979, an increase of over 9 percent from the previous year. In fiscal 1980 the President's budget calls for outlays of $532 billion, an increase of less than 8 percent. This 1980 figure includes a small real increase in defense spending, a constant level of real spending for domestic programs, and restraint in or deferrals of new spending initiatives. Because existing legislation mandates continued real growth in some programs, such as health care and social security, zero real growth in domestic spending can be achieved only through reductions in real outlays for a number of other programs. Holding outlays to $532 billion will require strenuous efforts by government agencies as well as cooperation from the Congress.

Over a year ago forecasts of economic activity suggested that the current economic expansion would slow too much unless the burden of rising taxes was eased. Inflation and economic growth were pushing people into higher tax brackets, and substantial increases in social security taxes had been legislated for 1979 and later years. To prevent too great a check on the expansion, these tax increases would have to be offset by a tax cut. A tax cut was also needed to encourage the investment that would provide the productive capacity for future economic growth and improve the prospects for greater growth in productivity.

Last January, the President therefore proposed a tax cut of $25 billion to take effect October 1, 1978. Since inflation was higher than expected, this was scaled back in May to a cut of $20 billion to take effect January 1, 1979. The size of the tax bill passed by the Congress is close to this request with a stimulus of $18.9 billion in 1979. The bill contains a $14.1-billion cut in personal taxes, a $6.5-billion cut in business taxes, and a $0.7-billion increase in outlays for the earned income tax credit, but allows $2.5 billion in jobs credits to expire.

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The Revenue Act of 1978

The Revenue Act of 1978 achieves cuts in individual income taxes largely by lowering the schedule of tax rates. It replaces the general tax credit, which was due to expire at the end of 1978, with an increase in the personal exemption from $750 to $1,000. The legislation also expands the earned income tax credit for the working poor and lowers the tax rates on capital gains. Its provisions include some of the tax reform proposals made by the President in his tax package.

In general the Revenue Act of 1978 will have relatively little effect on the after-tax distribution of income. Most households will receive a cut in tax liability of about 7 percent. Households with incomes above $200,000 and those with incomes below $10,000 will receive larger cuts. These distributional effects contrast sharply with those of the President's tax proposal, which called for larger tax cuts for those with incomes below $30,000 and smaller reductions for those with incomes above $30,000. In its effects the 1978 legislation will also differ markedly from income tax legislation enacted between 1964 and 1978, which increased the progressivity of the tax system.

The business tax cuts in the 1978 Revenue Act are attained primarily by lowering corporate income tax rates. The maximum rate is dropped from 48 to 46 percent, and a new tax schedule, with more income brackets and lower tax rates, is introduced. The tax rate on corporate income between $50,000 and $75,000 is cut the most, from 48 percent to 30 percent. The legislation also extends and expands the investment tax credit, providing a $500-million tax cut for business in 1979. Both of these cuts were in the package proposed by the President. Capital gains tax rates were also lowered in the 1978 legislation, reducing revenues by nearly $2 billion in 1979.

MONETARY POLICY

The combined effects of rising inflation and efforts by the Federal Reserve to hold down the growth of the monetary aggregates carried interest rates last year to near record levels. More restrained growth of the monetary and credit aggregates is an appropriate complement to the other parts of the anti-inflation program. It will help to moderate the rate of economic expansion. Additionally, higher U.S. interest rates make dollar-denominated assets more attractive than those denominated in foreign currencies and thus contribute to sustaining the value of the dollar in exchange markets.

Many private forecasters anticipate a recession in 1979, partly because they expect that current high interest rates will substantially depress housing and business investment. High interest rates are likely to dampen aggregate demand in 1979, but to a lesser degree than one would expect from past experience because of institutional changes in financial markets. Our judgment that economic growth in 1979 will be sustained reasonably well and that a recession will be avoided depends in part on our analysis of why the effect of monetary restraint is different from what it used to be.

During most of the postwar period, intervals of substantial monetary restraint were followed by recessions. Curbing aggregate demand through the use of monetary restraint disrupted financial markets because the depository institutions experienced a large outflow of deposits when interest rates on market instruments rose above the rates these institutions were permitted to pay to attract consumer savings. This disintermediation sharply reduced the availability of credit for those borrowers most dependent on commercial banks and thrift institutions for credit. These included small businesses and some units of State and local government, but the sector most severely hit was the mortgage market. As mortgage credit became not merely more expensive but unavailable, residential construction dropped precipitously, and this sharp drop was often important in tipping the entire economy into recession.

Table 19 shows periods of such cyclical declines in acquisitions of mortgages by financial institutions and the associated declines in single-family and multifamily housing starts. In the 1965–66 period the sharp decline in residential construction contributed to a slowing of overall economic growth, but the expansion of Federal outlays was sufficiently strong to maintain economic expansion. The 1959–60, 1969–70, and 1972–74 episodes were all followed by recessions. Of course, factors other than the decline in housing were also involved in each of these recessions, but the speed with which the decline in housing occurred had a destabilizing effect for which it was difficult to compensate elsewhere in the economy.

TABLE 19.—*Cyclical contractions in mortgage credit and housing starts, 1959–74*

[Percent change at seasonally adjusted annual rate, except as noted]

Period	Interest rate [1]	Mortgage acquisitions [2]	Housing starts	
			Single-family	Multifamily
1959 II to 1960 II	1.27	−12.7	−17.3	−16.4
1965 III to 1966 IV	1.41	−28.9	−28.5	−36.1
1969 I to 1970 I	1.35	−28.2	−23.1	−30.1
1972 IV to 1974 IV	3.36	−24.8	−22.9	−53.2

[1] Percentage point change in the quarterly average market yield on 6-month Treasury bills from the beginning of the period to the peak reached during the period.
[2] Acquisitions by financial institutions.

Sources: Department of Commerce (Bureau of the Census), Board of Governors of the Federal Reserve System, and Federal Home Loan Bank Board.

The first half of last year was somewhat like earlier periods of credit restraint. Short-term market interest rates rose well above rates payable on deposits. As shown in Table 20, deposit inflows at thrift institutions slowed, and so did their mortgage lending. In the second half of the year, however, deposits again began to grow rapidly.

TABLE 20.—*Growth in deposits, 1977–78*

[Percent change, seasonally adjusted annual rate[1]]

Type of deposit	1977				1978			
	I	II	III	IV	I	II	III	IV[2]
Commercial banks, total	9.5	8.7	9.8	12.1	10.0	10.4	10.5	7.7
Demand	7.6	7.5	8.9	5.5	3.9	12.6	9.2	−3.1
Passbook	17.3	5.6	11.3	1.5	2.6	1.3	4.6	−6.9
Other time	8.4	13.1	11.3	14.2	12.0	11.9	18.1	20.4
Large certificates of deposit (CDs)	−3.2	7.3	3.2	81.0	50.8	25.0	6.6	47.0
Nonbank thrift institutions, total	14.0	12.5	17.7	12.8	8.1	8.2	14.6	11.6
Savings and loan associations	20.9	14.8	15.4	10.7	13.3	10.0	12.0	----
Passbook	13.8	8.4	8.5	3.6	7.3	−4.3	−6.9	----
Other	25.8	19.3	20.0	15.4	17.1	19.3	24.0	----

[1] Changes are measured from end of quarter to end of quarter.
[2] Preliminary.

Sources: Board of Governors of the Federal Reserve System and Federal Savings and Loan Insurance Corporation.

As discussed in Chapter 1, the principal reason for this higher growth was the new regulation that permitted the issuance of money market certificates beginning last June. This change followed upon similar, but much smaller, steps taken in 1970 and 1973. In those instances interest ceilings were raised on longer-term certificates of deposit, thus reducing somewhat the vulnerability of thrift institutions to deposit outflows. (Passbook and shorter-term certificate ceilings were also raised slightly in 1970 and 1973.)

Other less obvious institutional changes have also modified the response of the economy to credit restraint. One of these is the expansion of secondary mortgage market activity. The Federal Home Loan Mortgage Corporation, established in 1970, issues its own mortgage-backed securities and purchases mortgages from the thrift institutions. The Government National Mortgage Association has developed a procedure whereby it guarantees securities that are issued by private institutions and backed by pools of mortgages insured by the Federal Housing Administration or guaranteed by the Veterans Administration. These securities have been purchased by a broad range of investors, many of whom were not previously in the mortgage market. Some thrift institutions have also begun issuing their own bonds, for which mortgages serve as collateral.

Institutional changes have also occurred in other financial markets. Commercial banks no longer depend primarily on liquidating U.S. Government securities to obtain funds for business lending, as they had done through the early part of the postwar period. The advent of liability management (exemplified by the issuance of negotiable certificates of deposit and the use of nondeposit sources of funds) has enabled most banks to obtain the funds they want for lending, provided they are willing to pay going rates of interest. Moreover, large firms can increasingly shift their borrowing between commercial banks and open market commercial paper, and between foreign and domestic sources, in response to differences in the cost and availability of funds. Their direct access to credit markets makes them less dependent on intermediation by institutional lenders. The expan-

sion of trade credit provides a mechanism through which large firms extend this benefit to smaller customers and suppliers.

The result of these institutional changes has been to smooth the response of the economy to increased restraint in financial markets. In place of sharp changes in availability of credit, there is now a more gradual response of credit users to changes in the cost of credit. Measured application of monetary restraint has become more feasible. The degree of restraint required to achieve the desired growth in private demand is difficult to judge, however, because the response of the private sector is likely to occur more slowly and to be diffused more widely than in the past. Moreover, the indicators showing the degree of restraint have changed, and experience in implementing monetary policy under present circumstances will come only gradually.

Over the near future, nominal interest rates are likely to remain relatively high by historical standards. It will take time to reduce the rate of inflation and the inflation premiums contained in interest rates. As inflation recedes, the maintenance of a restrained monetary policy will be consistent with a decline in nominal interest rates.

THE ECONOMIC FORECAST

The economy is entering 1979 with substantial momentum, and economic expansion will be bolstered by the recently enacted tax bill, which will help to sustain consumer expenditures during the first half of the year. Later in the year, as the effect of the tax cut wears off, a slower expansion of consumer purchases is foreseen. Partly as a response to current high interest rates, housing starts are expected to decline and the growth of business fixed investment to diminish during the year (Table 21).

TABLE 21.—*Economic outlook for 1979*

Item	1978 [1]	Forecast range 1979
Growth rates, fourth quarter to fourth quarter (percent):		
Real gross national product	4.3	2 to 2½
Personal consumption expenditures	3.8	1¾ to 2¼
Nonresidential fixed investment	8.3	4 to 4½
Residential investment	−.8	−8½ to −9½
Federal purchases	−.3	¾ to 1¼
State and local purchases	3.5	1¾ to 2¼
GNP implicit price deflator	8.3	7¼ to 7½
Compensation per hour [2]	9.8	8¼ to 8¾
Output per hour [2]	.5	¼ to ¾
Level, fourth quarter: [3]		
Unemployment rate (percent)	5.8	6 to 6½
Housing starts (millions of units [4])	2.1	1½ to 1¾

[1] Preliminary.
[2] Private business sector; all persons.
[3] Seasonally adjusted.
[4] Annual rate.

Sources: Department of Commerce (Bureau of Economic Analysis), Department of Labor (Bureau of Labor Statistics), and Council of Economic Advisers.

Growth is likely to be stronger in the first half of the year than in the second half. Housing starts are expected to bottom out during the fourth quarter of 1979 and begin to move up in 1980 as pressures in money and credit markets ease with the decline in the rate of inflation. The upturn in housing is a principal reason for the anticipated increase in the rate of economic growth in 1980.

The rate of increase of the GNP deflator is expected to decline from 8.3 percent in 1978 to slightly under 7½ percent during the 4 quarters of 1979; a further drop to just under 6½ percent is probable during 1980, partly as a result of a tightening of the pay and price standards. Inflation is likely to remain high during the first half of 1979, however, because of the minimum wage increase in January, the delayed effects on import prices of the decline in the value of the dollar, the oil price increases by the Organization of Petroleum Exporting Countries (OPEC), and the continued rise in food prices. As the year proceeds, these factors will put less upward pressure on prices, and the effects of the President's anti-inflation program should be increasingly felt. Consequently the increase in consumer prices is expected to fall to an annual rate of below 7 percent by late in the year.

Consumption

Consumption has been a major source of strength in the current expansion. Consumers have increased their spending by more than the rise in their after-tax incomes, reducing the saving rate from almost 8 percent in 1975 to under 5 percent in the last quarter of 1978. Some of the possible reasons for this low saving rate were discussed in more detail in Chapter 1.

In 1979 the saving rate is expected to rise moderately but remain well below its 6 percent average of the 1950s and 1960s. Much of this increase will reflect less intensive use of consumer credit, which expanded sharply during 1978. Automobile sales in particular are not likely to rise further in 1979 and may fall slightly from the high level of the 1978 model year. Purchases of furniture and household equipment may also decline as a result of the expected reduction in residential construction.

Continued growth in purchases of nondurables and services should allow personal consumption expenditures to rise in real terms at a rate of about 2 percent, close to the projected rate of growth of real GNP but below the rate of increase in real disposable income.

As inflation abates during 1979, consumer confidence in the economy should improve and thus strengthen consumer markets in 1980. The saving rate is consequently expected to decline in 1980. During that year, however, rising effective tax rates will tend to slow the growth of disposable income; the increase in consumer spending is thus likely to be somewhat less than the rise in real GNP.

Business Fixed Investment

Business fixed investment in 1972 dollars should grow at a rate of about 4 percent during 1979, measured from fourth quarter to fourth quarter. This estimate represents a slowdown from the 8.3 percent increase for 1978, but the increase is still above the expected growth in real GNP. Investment is foreseen to remain relatively strong in the first half of 1979 but to slow later in the year with the rest of the economy. Moderate improvement from the less rapid rate of the second half of 1979 is expected during the course of 1980.

Indicators of the probable pace of investment next year are mixed. Higher rates of capacity utilization are encouraging new and replacement investment, and contracts and orders for plant and equipment are rising rapidly. Orders for nondefense capital goods in October and November were 12½ percent above their third quarter level. Unfilled orders for nondefense capital goods at the end of November stood 6 percent above their September level.

Moreover the Revenue Act of 1978 should provide some encouragement for business fixed investment. Profits seem likely to remain relatively high throughout the next year, falling only marginally from their current share of GNP. The confidence of investors with regard to future inflation should improve as the Administration's anti-inflation initiatives take hold.

Not all the forces influencing business investment decisions are positive. Expectations of a slowdown in economic activity next year are widespread and may already be holding back investment plans. Nominal interest rates have risen to very high levels, and their effects will be felt increasingly as 1979 progresses. Some reduction in investment in motor vehicles may also follow the recent large purchases of cars and trucks by businesses. This drop in sales may restrain discretionary capital spending by the auto industry, although the industry will still have to maintain a high level of capital outlays to meet the requirements of government regulations.

The latest Commerce Department survey of business investment intentions found that businesses are planning to increase their outlays for new plant and equipment in 1979 by 11.2 percent in current dollars. This compares with an actual rise of 12.7 percent in 1978. If capital goods prices rise in 1979 by the 8 percent figure expected by survey respondents, the real increase in outlays for plant and equipment in 1979, measured on a year-over-year basis, would be about 3 percent. Measured from fourth quarter to fourth quarter, the increase would be less.

In the past 3 years total outlays for business fixed investment in the national income and product accounts have exceeded the amount included in the plant and equipment survey by a large and widening margin, even after allowance has been made for conceptual differences in coverage of the two series. This margin may well persist in 1979. The results of the Department of Commerce survey thus seem consistent with our forecast, which calls for a moderate slowdown this year in this key element of aggregate demand.

Housing

The number of housing starts and the real volume of residential construction are likely to decline in 1979 from the high levels of last year, in large part because prospective home buyers will be deterred by the high level of mortgage interest rates. In areas where mortgage rates are limited by usury ceilings, some constraints have developed on the availability of credit. This should not greatly affect the national total of housing starts, but it may restrain housing sales and residential construction in some parts of the country. By the fourth quarter of 1979 housing starts are expected to fall to an annual rate of around 1¾ million or somewhat less, a decline that is significant but less steep than in most postwar periods of tight money.

The prospects for housing this year will depend importantly on whether thrift institutions continue to attract funds through money market certificates and to make the proceeds available to potential home buyers. Margins between mortgage yields and the cost of issuing the certificates have narrowed. Some thrift institutions may therefore pay less than the maximum permissible yield on money market certificates and in other ways market them less aggressively. Moreover, there may be some diversion of funds from mortgages to higher-yielding short-term liquid assets. The potential for strengthening longer-term earnings by issuing money market certificates and acquiring long-term, high-yield mortgages in such a period is nonetheless attractive.

The effect of these new money market certificates in reducing current earnings of thrift institutions is a matter of concern. However, the certificates still represent a small proportion of total deposits (less than 10 percent at year-end). Moreover, at least half of the money going into the money market certificates appears to be coming from outside the thrift institutions, and some of the remainder is being converted from high-yielding certificates rather than from low-yielding passbook accounts. In view of the high level of earnings on the mortgage portfolio—about 8½ percent in the second half of last year—thrift institutions in general are in a favorable position to cope with higher deposit costs for a limited time, although the earnings and cost positions of individual institutions undoubtedly vary considerably.

Given reasonable prospects for the availability of mortgage credit, the primary determinant of the volume of housing starts will be the response of home buyers and builders to the higher level of mortgage interest rates. The rate on new mortgage commitments had risen sharply to nearly 11 percent by the end of last year.

Virtually all of the projected decline in housing starts is likely to be in single-family units. Following last year's upturn, construction of multifamily units will probably level out in 1979 in response to the high costs for building loans, which often have to be carried a long time. But the decline in the rental vacancy rate from a peak of 6.2 percent in 1974 to a historically

low level of 5.0 percent late last year implies a strong demand that should sustain multifamily construction.

The demand for single-family homes will also be supported by demographic factors. Between 1973 and 1978 the number of people in the 25–29 age group grew by 16 percent, and the 30–34 group grew 22 percent. By 1983, population in these two age groups is expected to rise nearly 14 percent, somewhat below the rate of the last 5 years but far above the rates prevailing before 1970. In fact the population in this age group will grow more in the next 5 years than it did in the 15 years up to 1970. The largest number of first-time home buyers is in the 25–34 age bracket. More than half of the married couples aged 25 to 29 and nearly three-fourths of those between 30 and 34 own their own homes. Although the proportion of married couples in the total number of U.S. households has been declining, this change has been offset by the rise in homeownership among single persons.

Given the favorable demographic trends and low vacancy rates, it is quite likely that housing starts will begin to rise as inflation and nominal interest rates ease late next year. The forecast anticipates a rise in housing starts to about 1.9 million units by the fourth quarter of 1980. Residential construction is expected to add nearly as much to real GNP growth in 1980 as it subtracted in 1979. This projected turnaround in housing activity is the principal reason for expecting somewhat stronger economic growth in 1980.

Inventories

Businesses throughout this recovery have pursued a cautious policy on inventory accumulation, as noted in Chapter 1. Ratios of inventories to sales have been kept relatively low for this stage of the recovery, and there are no major inventory imbalances that would depress economic activity this year. Since growth in final sales is expected to moderate in 1979, however, the rate of inventory investment may decline slightly if businesses continue to pursue their conservative inventory policies, as seems likely. Heightened inventory accumulation may occur in 1980 as final sales again become stronger.

Net Exports

During 1978, for the first time in this recovery, the foreign sector provided some support to the expansion of GNP. The volume of exports rose, and the growth of import volumes slowed from its rapid pace at the beginning of the year. The foreign sector should continue to contribute to growth in 1979.

In many foreign countries, growth of domestic demand began to pick up during the course of 1978, and this movement should increase somewhat more this year, chiefly because of a shift toward more expansionary fiscal policies in Germany and Japan in late 1978. More rapid growth of foreign demand will help to raise demands for U.S. exports. At the same time, the

deceleration of growth in the United States is acting to reduce the growth of import volumes. In 1979, for the first time since 1975, growth rates in the major foreign countries are likely, on average, to exceed growth in the United States.

The marked depreciation of the dollar from September 1977 through October 1978, which has been only partially reversed since then, will also help to improve our net exports in 1979. Since trade volumes adjust only slowly to changes in relative prices, the principal effects of the dollar depreciation on imports and exports are not yet evident.

U.S. exports tend to respond more strongly to relative price shifts than imports do, but with longer lags. Exports of nonagricultural merchandise in 1972 dollars are expected to grow by 7 to 10 percent in 1979; agricultural exports, on the other hand, are not likely to increase from current high levels. Slower economic growth in 1979 and last year's depreciation of the dollar should limit the rise in the volume of non-oil imports this year. Despite an expected rise in the volume of oil imports, the merchandise trade balance should improve in 1979.

An important development in the structure of our foreign balance over recent years has been a marked surplus in net exports of services, especially fees, royalties, and earnings of American enterprises abroad. In the early years of this decade the United States was near balance on services, but in 1977 the service component of the current account showed a surplus of $16 billion, and the surplus rose to an annual rate of $18 billion in the first 3 quarters of 1978. In the near future this trend should continue, since the comparative advantage of a mature industrial country like the United States will increasingly lie in exporting capital and technology.

Government Demand

Purchases of goods and services by both the Federal and the State and local sector will rise in 1979 and 1980, but the amount of growth will be relatively small in real terms.

The President's budget calls for Federal outlays of $493 billion in fiscal 1979 and $532 billion in the next fiscal year. Purchases of goods and services, comprising roughly one-third of these expenditures, are concentrated in defense outlays, where Federal expenditures are projected to rise in real terms. Total real Federal purchases are expected to increase 1 percent during 1979 and to fall slightly during 1980. The 1979 increase follows a small decline in real Federal purchases during 1978.

Although State and local purchases will continue to grow in real terms during 1979 and 1980, two recent developments indicate a slowing in the rate of increase from the 3½ percent rate of 1978. First, as Chapter 1 noted, sentiment among voters appears to favor limiting the growth of State and local taxes and expenditures, as evidenced by the passage of Proposition 13

in California and successful budget-cutting referenda in eight other States in 1978. Second, Federal aid to State and local governments, which had been growing rapidly, will level off over the next 2 years.

These developments suggest that the rate of growth in real State and local purchases may moderate to about a 1½ to 2 percent annual rate over the next 2 years. The operating balance of the State and local sector, which was in surplus by about $6.6 billion in 1978, is expected to shift to a small deficit in 1979 and 1980.

Labor Force and Employment

Growth in the labor force and in employment cannot be expected to continue at the exceptionally rapid rates of the past 3 years. The slower rate of real economic growth foreseen for 1979 and 1980 and trends in the age structure of the population make it reasonable to expect growth rates for both labor force and employment to decline toward their long-term trend.

The civilian labor force has grown at an annual rate of about 2¾ percent over the past 3 years, up from an average around 2¼ percent in the first 5 years of the decade. This recent pace is much more rapid than the average annual growth of 1.7 percent during the past 30 years. There have been two principal reasons for the relatively high growth of the labor force lately. The number of persons between the ages of 16 and 24, the normal age for entering the labor force, is large because of the peak birth rates in the late 1950s; and a higher proportion of women and teenagers have joined the labor force. Reductions in the size of the Armed Forces were also a factor in the earlier part of the decade. In the past 3 years the labor force participation rate has gone up a full 2 percentage points. The rapid expansion of employment opportunities during this period has undoubtedly had an important bearing on this striking increase.

In 1979 and 1980 the factors outlined above are expected to have less effect on labor force expansion. The rate of growth in the noninstitutional population at ages 16 and older will decline from the 1.7 percent per year average of the early and middle 1970s to 1.5 percent in 1979 and 1.4 percent in 1980. Slower growth of real output will cause the participation rate to rise less rapidly, but it may remain above its long-term average annual growth of 0.2 percentage point. The growth rate for the civilian labor force is expected to average about 2¼ percent per year in 1979 and 1980.

The rate of increase in employment will be limited by slower growth in real aggregate demand. Average employment in the fourth quarter of 1979 should be about 2 percent above that in the fourth quarter of 1978. Employment growth during 1980 is expected to be about 2¼ percent, compared to an average annual employment growth in the preceding 3 years of over 3½ percent.

These projections concerning employment and the labor force imply a small rise in the unemployment rate. Unemployment is expected to increase to about 6¼ percent of the labor force by late 1979 and to remain near that level in 1980. Forecasts of unemployment rates must be regarded as highly uncertain, however, because of the difficulties inherent in predicting growth in the labor force, in productivity, and in output.

PRICE AND WAGE DEVELOPMENTS

The outlook for prices and wages in 1979 is affected in important ways by the Administration's anti-inflation program. A significant reduction of inflation will require widespread cooperation and compliance with the wage and price standards.

The wage standard limits increases in compensation generally to 7 percent, but even with full compliance by groups not exempt the rise in private compensation is likely to exceed 7 percent. Equity and flexibility require some groups to be exempt from the pay standard, including workers who are covered by collective bargaining agreements negotiated before the announcement of the anti-inflation program on October 24, 1978, and those who were earning less than $4.00 per hour on October 1, 1978. Many workers qualifying for the low-wage exemption received substantial increases on January 1, when the minimum hourly wage was raised from $2.65 to $2.90 as a result of the 1977 amendments to the Fair Labor Standards Act. Others in this group may be indirectly affected if wages slightly above $2.90 are raised to maintain normal wage differentials. On average, wages and private fringe benefits of those qualifying for the low-wage exemption are expected to increase between 8½ and 8¾ percent.

Deferred increases in compensation due in 1979 under existing collective bargaining agreements are also exempt. These increases vary considerably, but the average, including allowance for cost-of-living provisions, is likely to be in the 8¼ to 8½ percent range.

New labor contracts will play an important role in wage changes in 1979 when a new round in the 3-year collective bargaining cycle begins. For these contracts, an employee group is in compliance if the agreement provides for pay increases that do not exceed 7 percent per year over the life of the contract. But increases in any one year may be as large as 8 percent. Industries where major multiyear agreements will be negotiated in 1979 include petroleum, trucking, rubber, electrical equipment, meatpacking, and automobiles. In all, the wages of almost 4 million workers in bargaining units with 1,000 or more workers, and of a similar number in smaller units, will be determined for the next 2 to 3 years. In the previous 1976–77 round of negotiations many of these agreements provided for double-digit annual rates of pay increase. A repetition of such large increases would have serious inflationary consequences not only in 1979 but in subsequent years.

Despite the large number of exempt workers, a high rate of compliance by those not exempt—who account for about two-thirds of the entire wage

and salary bill—will still produce significant deceleration. Substantial compliance would limit the rate of increase of total private wages and fringe benefits to about 8 percent. Total employee compensation per hour, including employer payroll taxes, would then increase by about 8½ percent in 1979, a significant deceleration from the 9¾ percent increase in 1978.

Because of the continued rapid escalation of food prices, increases in the minimum wage and social security taxes, the rise in OPEC oil prices, and the continued pass-through of higher prices for other imports, inflation is likely to remain relatively high in the first part of 1979. As the year progresses, the rise in consumer prices should fall somewhat below a 7 percent annual rate, a rate consistent with the underlying rise in labor costs.

A deceleration of wage and price increases during 1979 will be an important first step in braking the momentum of inflation. Expectations of continuing inflation would then begin to give way to the prospect of smaller increases in wages and prices. Further progress could be made more certain in 1980 by adjusting the pay and price standards. The special factors boosting inflation in 1978 and 1979—food price increases, payroll taxes, medical costs, depreciation, and energy prices—may also have less effect in 1980. We can reasonably expect further gains in reducing inflation. The rate of increase of consumer prices is projected to fall to just under 6½ percent during 1980.

Food prices over the 4 quarters of 1979 are expected to rise between 7 and 8 percent, significantly below last year's 11 percent. During the first half of the year, however, food price increases may be larger than during the second half, as the food processing and marketing system reacts to increased costs for labor, energy, packaging, and transportation, as well as to higher prices for wheat, cocoa, and sugar. Prices of dairy products and the cost of food consumed away from home are projected to rise considerably in the first half of the year.

An important reason for higher food prices in 1979 is likely to be a continued reduction in supplies of beef. Because of a decline in the number of cattle, total beef production in 1979 is likely to be lower than in 1978. Production of pork and poultry is expected to rise significantly, however, especially in the second half of the year, and per capita consumption of all meats is therefore likely to decline by less than 1 percent.

Some encouraging signs for food prices can be discerned. After increasing very sharply in the first half of 1978, the index of prices that farmers receive for crops remained quite stable during the second half of the year. This suggests that, with normal winter and spring weather, no immediate inflationary pressure should appear at the retail level because of abnormal increases in farm crop prices. The favorable prospects for the grain and soybean crops that will be harvested in the Southern Hemisphere this spring and the higher level of world stocks of these commodities are also reassuring. Hog and poultry producers are geared to expand production significantly, helping to offset lower beef supplies. As the Administration's

anti-inflation program begins to show tangible results, pressure on processing and marketing margins is also expected to moderate.

Energy prices will rise substantially in 1979, in large part as a result of the 14½ percent increase in oil prices announced by OPEC. This OPEC increase will add almost 0.4 percent to the consumer price index by the end of 1979 (compared to what would have happened if OPEC oil prices had remained stable), and some further effect will be felt in 1980. Domestic energy prices will also increase. The deregulation of natural gas will add to the price of energy, and further rises in coal prices can also be expected.

Mortgage interest costs are likely to rise less rapidly in 1979 than in 1978 as nominal mortgage interest rates level off and as the housing market weakens. In 1978 mortgage interest costs, which include the effects of rising prices for homes and higher mortgage interest rates, rose about 20 percent.

Import prices have already risen significantly in conjunction with the decline in the dollar on foreign exchange markets during 1978. To the extent that foreign exporters do not absorb the effects of this depreciation, some further price rises are likely in 1979.

Hospital costs, which for several years have increased at nearly twice the rate of overall consumer prices, moderated somewhat in 1978. Further moderation is expected in 1979 and 1980 in response to official action at two levels: hospital cost containment legislation to be proposed by the Administration, and State cost containment programs.

ECONOMIC OBJECTIVES AND POLICY FOR THE LONGER RUN

During the past 2 years this Administration has developed its economic policies within the context of longer-term objectives for the economy. That approach was embedded in law during 1978 by the planning procedures incorporated in the newly enacted Humphrey-Hawkins Full Employment and Balanced Growth Act. This act establishes procedures for developing and reviewing economic policies within the government, requires the government to set 5-year goals for the American economy, and challenges it to formulate policies to achieve them.

For the past three decades the Employment Act of 1946 has been the basic guide for the President and the Congress in the development of economic policies. The Employment Act charged the government with responsibility to promote maximum employment, production, and purchasing power through the use of the policy tools at its disposal. Since 1946 the instruments of fiscal and monetary policies have been used in ways that contributed to economic prosperity. In recent years, however, the view has become widespread that amendments to the Employment Act would be an appropriate response to the changed economic circumstances and the serious new difficulties that we face in today's economy. The Full Employment and Balanced Growth Act of 1978 was designed to address these difficulties.

THE HUMPHREY-HAWKINS ACT

The new law strengthens the Employment Act in three essential respects. It explicitly identifies national economic priorities and objectives; it directs the President to establish, and the Congress to consider, goals based on those priorities and objectives; and it creates new procedures and requirements for the President, the Congress, and the Federal Reserve to improve the coordination and development of economic policies.

The priorities and objectives set forth in the new act are varied, reflecting the nature of today's economy. The act establishes as a national goal "the fulfillment of the right to full opportunities for useful paid employment at fair rates of compensation of all individuals able, willing, and seeking to work." The new act also specifies "reasonable price stability" as a national objective and recognizes the need to improve government policies for dealing with inflation. Emphasis is placed on encouraging private and public capital formation to promote full employment, growth in productivity, and price stability. The act responds to the widespread desire for reduced governmental intervention by calling for steady reductions in the share of the Nation's output accounted for by governmental spending and by relying primarily on the private sector to meet the act's objectives. It also specifies that a balanced Federal budget, consistent with the achievement of other goals, is to be an objective of national policy. Finally, the act stresses the position of our economy in international markets. Those who make public policy are called on to work to improve the trade balance of the United States as well as its competitive position in world trade, while promoting fair and free international trade and a sound and stable international monetary system.

To provide a better focus for the government in its effort to achieve these general objectives, the Full Employment and Balanced Growth Act requires that the Administration set annual numerical goals for key indicators in the economy over a 5-year period, including employment and unemployment, production, real income, productivity, and prices. Goals for the first 2 years of the 5-year period are considered short-term objectives, and the President is required in his budget to recommend levels of outlays and receipts consistent with them. Goals for the final 3 years are known as medium-term goals, and projections of outlays and receipts consistent with them are to be included in the President's budget.

The act establishes new procedures for developing economic policies within the Federal Government. Each year the President is to present a program for achieving the economic goals he has set. As a matter of general guidance, the act provides that the government should rely as far as possible on growth in the private sector to meet goals for employment and output. At the same time, it calls the President's attention to a variety of governmental measures for dealing with unemployment, inflation, inadequate capital formation, and other problems. No new programs are specifically required or author-

ized in the act, however, and the President would need additional legislation to put new programs into effect.

To improve the coordination of fiscal and monetary policies, the act requires the Federal Reserve Board to report to the Congress twice each year on its objectives and plans with respect to monetary policies. The Board, in its reports, is required to comment on the relation between its plans for monetary policy and the short-term economic goals established by the President.

The policies of the President and the Federal Reserve Board will be considered jointly by the Congress. The act directs the Joint Economic Committee of the Congress to review reports from the President and the Federal Reserve Board, together with submissions from the committees of the Congress, and to offer its findings regarding the economic situation to the Budget Committee in each House prior to development of the First Concurrent Resolution on the Budget. Four hours during the debate on that resolution in each House will be reserved for debate on economic policies and goals and specific budgetary plans for achieving economic objectives. Through this process of reports and debate, the new act aims to improve economic decisions by providing better ways of arriving at them and better information on which to base them.

The Full Employment and Balanced Growth Act stipulates that in the first *Economic Report* published under the act the goal for unemployment in 1983 should be 4 percent for workers aged 16 and over and 3 percent for workers aged 20 and over. The act also requires that the goal for the rate of increase in the consumer price index in 1983 should be 3 percent.

Beginning with the 1980 *Economic Report of the President,* the President is authorized under the new act to change the timetable for achieving the goals if he determines that such a change is necessary. If the President changes the 4 percent and 3 percent unemployment goals, however, his *Economic Report* must state the year that he expects the unemployment goals to be reached.

GOALS FOR THE ECONOMY TO 1983

Lower unemployment and inflation rates are basic objectives, but they are not, of course, the only economic aims of the Administration or the new act. As noted earlier, the Humphrey-Hawkins Act places a high priority on improving the competitive position of the U.S. economy in the world, encouraging the growth of investment and capital formation, reducing the share of Federal spending in the Nation's output, and balancing the budget. In formulating economic policies for the next 5 years, these additional concerns have been taken into consideration.

Economic goals consistent with those specified in the act are shown in Table 22. The short-term goals for 1970 and 1980 represent a forecast of how the economy will respond over the next 2 years not only to the budgetary policies proposed by the President for fiscal 1979 and 1980 but to the anti-inflation program announced on October 24. The medium-term goals for

1981 to 1983 are not forecasts. They are projections of the economic performance that would be required to reach the 1983 unemployment and inflation goals specified in the act.

TABLE 22.—*Economic goals, 1979–83*

Item	1979	1980	1981	1982	1983
	Level, fourth quarter [2]				
Employment (millions)	97.5	99.5	102.6	105.5	108.3
Unemployment (percent)	6.2	6.2	5.4	4.6	4.0
	Percent change, fourth quarter to fourth quarter				
Consumer prices	7.5	6.4	5.2	4.1	3.0
Real GNP	2.2	3.2	4.6	4.6	4.2
Real disposable income	2.8	2.3	4.4	4.4	4.0
Productivity [1]	.4	1.1	1.8	2.0	2.0

[1] Based on total real GNP per hour worked.
[2] Seasonally adjusted.

Source: Council of Economic Advisers.

The rate of GNP growth for the 1981–83 period that will be needed if unemployment is to be reduced to 4 percent by 1983 will depend on the growth rates of the labor force and productivity. Trends in these variables are hard to predict, as experience in the past 2 years indicates.

Over the next 5 years, growth in the population aged 16 and over will decline significantly, from about 1.6 percent in 1978 to about 1.0 percent in 1983. The rate of increase in the labor force participation rate (the ratio of persons in the civilian labor force to the total number within the working-age range) also seems likely to slow. During recent years the participation rate has increased by at least 0.8 percentage point annually, well above the long-term trend. With slowing growth both in the working-age population and in the participation rate, increases in the labor force will taper off from current rates of 2 to 3 percent a year to perhaps 1¾ to 2 percent 5 years from now.

This slowing of labor force expansion will reduce the GNP increase that will be needed to achieve any given reduction in the unemployment rate. At the same time, however, it is reasonable to expect productivity growth to improve somewhat over that of 1978. The slowing of labor force expansion will be accompanied by a shift in the age distribution of the labor force toward more mature workers, and the average experience of the labor force will also be lengthened by a reduction in the number of new entrants. These developments will help to stimulate greater productivity growth. Strong growth of investment could also improve the outlook for productivity.

These considerations suggest that potential GNP over the next 5 years might continue to increase at about the 3 percent rate of the past 5-year

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period. There may be some slowdown in the growth of potential output during the next 5-year period as increases in the working-age population taper off, but information on labor force and productivity trends is not sufficient to permit a forecast of when it will happen.

In developing the projections in Table 22 for 1981 to 1983, a potential GNP growth of 3 percent was therefore assumed. The trend rate of increase in productivity underlying this estimate is 1½ percent, while the trend rate of increase in the labor force is 2 percent; these two numbers add to more than the 3 percent increase in potential GNP since average hours worked are expected to keep declining, as they have done through most of the postwar period. The yearly increases in the labor force and productivity shown in the table vary from the long-term trend because they will be influenced by the actual growth rate of real GNP in that year.

Jobs and training programs to reduce structural unemployment might make it possible to achieve the goal of a 4 percent overall unemployment rate, and 3 percent for adults, with a somewhat lower rate of growth of real output. Although such programs are primarily aimed at reducing the unemployment rate that is consistent with stable prices, they may, at least in the short run, tend to increase the level of employment and reduce the unemployment rate that is consistent with any given level of real output.

The increase in real disposable income from 1981 to 1983 is derived from historical relationships between that variable and real GNP, assuming no major changes in income shares between personal income and corporate profits.

REQUIREMENTS TO ACHIEVE THE ECONOMIC GOALS

By any criterion these are very ambitious goals. Achieving all of them simultaneously would demand not only a performance by the American economy that is unprecedented in peacetime history, but also government programs that can deal effectively with some of our most intransigent problems, particularly inflation and structural unemployment. The fact that the aims are ambitious makes it all the more important to consider carefully and realistically the obstacles to achieving them.

The difficulties likely to be encountered in moving the economy along the path set out in Table 22 follow two broad lines. First, will aggregate demand for goods and services be great enough to propel the economy along a relatively fast growth track from 1981 to 1983? What kind of budgetary policies would be required over the next several years to achieve this kind of economic growth? Second, if real economic growth did proceed at the pace needed to reduce the unemployment rate to 4 percent by 1983, what are the prospects that the inflation rate would decline to 3 percent by that year, and what are the principal obstacles to such a decline?

Answers to these two groups of questions are related. The likelihood of achieving rapid and sustained economic growth while inflation remains high is very small. Inflation gives rise to forces that raise interest rates and

discourage investment. It also increases the uncertainties facing businesses and consumers, and at times in the past it has severely weakened their propensity to spend. Because inflation reduces confidence abroad as well as at home, it can undermine the value of the dollar, giving rise to further inflationary pressures. The new act recognizes that inflation and growth are not separable concerns, and that public policy must seek ways both to achieve low unemployment and to control inflation.

Adequacy of Aggregate Demand

The growth rates of real GNP that will be needed in 1981–83 to reach the goal of a 4 percent unemployment rate by the end of that period are quite high by past standards, but they are not unprecedented. The average rate of growth for those 3 years, 4½ percent, is actually somewhat lower than the average rate of economic expansion from the last quarter of 1975 to the last quarter of 1978, which was 4.8 percent. In evaluating the difficulties in maintaining a 4½ percent average yearly growth rate of real GNP, however, one should recall that the current expansion will soon be entering its fifth year.

The course of economic policies that would ensure sufficient aggregate demand growth to permit the economy to grow at a 4½ percent rate from 1981 through 1983—and still avoid excess demand that would interfere with the unwinding of inflation—can only be described in very general terms. Our ability to foresee economic developments and to design appropriate policies to deal with emerging problems over a 5-year period is extremely limited. The outlook for 1979 is uncertain, the prospects for 1980 are much more so, and the probable course of later developments can be foreseen only dimly. The best we can do is to rely on past experience to indicate possible future patterns of economic activity and tell us the kinds of economic policies most likely to contribute to a strong economy over the next 5 years.

One way to evaluate the prospects for maintaining strong economic growth is to consider the distribution of saving and investment by sector. Defined in terms of the national income and product accounts, a sector is a net saver if its income receipts exceed its expenditures. If expenditures exceed receipts, the sector has engaged in dissaving, that is, in net investment. For the economy as a whole, expenditures and receipts are two sides of the same coin, and hence measured saving and investment must always be equal. What one sector saves, another must invest.

This equality of saving and investment in the aggregate is, of course, an accounting identity. There is no reason why decisions to save and invest should lead to a balance in each of the various sectors of the economy, and generally they will not. But when desired amounts of saving and investment do not match, adjustments occur in the economic system—such as changes in interest rates, levels of economic activity, or prices—that force saving and investment into balance.

The relation between saving and investment and the level of economic activity can be seen by comparing the distribution of net saving by sector in 2 recent years, 1973 and 1975 (Table 23). In 1973, a year of relatively full employment, investment incentives in the private sector were strong. Gross private investment—including residential construction and business outlays for plant, equipment, and additions to inventories—was large enough that it more than offset gross private saving. The governmental sector was close to balance: a small deficit in the Federal sector (as measured in the national income and product accounts) was offset by a surplus in State and local governmental budgets. In 1975, a year of recession, investment propensities were comparatively weak. Gross private investment was far below the volume of private saving, even though the latter was not much larger in relation to GNP than it had been in 1973. The counterbalancing item was a deep governmental deficit mainly due to the fact that Federal receipts were depressed below the levels that would have occurred in a more fully employed economy.

TABLE 23.—*Net saving by sector, 1973 and 1975*

[Net saving, or investment (—)]

Sector	1973		1975	
	Billions of dollars	Percent of GNP	Billions of dollars	Percent of GNP
Private sector:				
Personal	70.3	5.4	83.6	5.5
Business [1]	—77.2	—5.9	—7.4	—.5
Government sector:				
Federal	—6.7	—.5	—70.6	—4.6
State and local	13.0	1.0	6.2	.4
Foreign sector [2]	.6	([3])	—11.9	—.8

[1] Gross business saving plus the statistical discrepancy minus gross private domestic investment.
[2] Net capital grants received by the United States less net foreign investment.
[3] Less than 0.05 percent.

Source: Department of Commerce, Bureau of Economic Analysis.

Maintaining relatively strong growth from 1981 through 1983 will require that the excess of private investment over private saving be large enough to offset the net saving by both the governmental sector and the foreign sector in a high-employment economy. Large governmental surpluses would tend to make that task more difficult, as would large net saving by the foreign sector.

Prospects for State and Local Budgets

During recent years the aggregate surplus in the State and local sector, as measured in the national income and product accounts, has been fairly large, as much as 1.6 percent of GNP in 1977. The magnitude of this surplus is mainly the result of net payments into social insurance funds for

State and local employees. But in 1976 and 1977 the aggregate operating and capital budget of State and local governments was also in surplus because of slow growth of capital expenditures and substantial increases in Federal grant programs. During 1978 the operating and capital accounts have returned to approximate balance; given the strong demands by citizens to reduce State and local taxes, a return to surpluses seems unlikely over the next 5 years. The amount of net saving in the State and local sector between now and 1983 is therefore likely to depend mainly on the accumulation rate of the social insurance funds.

That accumulation rate has been moving up rapidly in the past decade, from about one-half of 1 percent of GNP in the middle 1960s to about 1 percent at present. This buildup derived from the relatively rapid increase of State and local employment during the period and the effort by State and local governments to fund their pension liabilities. The upward trend in the ratio to GNP is not likely to continue. Growth of employment in State and local governments no longer exceeds the national average, and a good deal of funding of existing pension liabilities has already been accomplished. Projections by several prominent private forecasting services put the accumulation rate of State and local social insurance funds in 1982 and 1983 at around three-fourths of 1 percent of GNP.

Net Foreign Saving

The measure of net saving by the foreign sector in the national income and product accounts is conceptually similar to the current account deficit in the balance of payments. (The principal difference between them is that the unrepatriated earnings of U.S. firms abroad are counted as an export of services in the current account balance, but not included as part of net saving by the foreign sector.) A projection of net foreign saving or of the current account balance in 1983 or any single year would be extremely hazardous. In the past 2 years, net foreign saving has been about 1 percent of GNP; in 1975, on the other hand, the foreign sector showed net dissaving—that is, net investment—by an amount equal to 0.8 percent of GNP. Relative growth rates in economic activity here and abroad, differences in the rate of wage and price increases, changes in exchange rates, and other factors can cause large movements from one year to the next in our current account balance and hence in net foreign saving.

Looking at trends over a 5-year period, it would be reasonable to expect market forces to bring receipts and payments on current account close to balance, and the net amount of foreign saving close to zero. A tendency in that direction is already under way. This year the current account deficit is forecast to decline significantly, and a further reduction in 1980 is expected. By 1982 and 1983, therefore, a reasonable forecast of net saving by the foreign sector would be zero.

The Federal Budget

Prospects for the Federal budget, of course, depend importantly on the fiscal policies pursued in the years from 1981 to 1983. If there were no further changes in tax laws or Federal expenditure programs other than those recommended in the fiscal 1980 budget, and if the economy grew as described in Table 22, Federal receipts would rise much faster than outlays. With such a "current policy" budget (Table 24), Federal outlays would decline as a share of GNP to under 20 percent by 1983; but Federal receipts would rise as a proportion of GNP, reaching nearly 22 percent by 1983. This rise in receipts results from inflation and real growth, which push individuals into higher tax brackets, and from the impact of large increases in social security taxes scheduled under current law, particularly in calendar years 1981 and 1983. The unified budget would therefore move from a deficit of $29 billion in fiscal 1980 to a surplus of $73 billion by fiscal 1983.

TABLE 24.—*Federal unified budget receipts and outlays under current policy budget, fiscal years 1979–83*

[Fiscal years]

Item	1979	1980	1981	1982	1983
Billions of dollars:					
Receipts	456.0	502.6	576.8	652.6	718.3
Outlays	493.4	531.6	578.0	614.9	645.6
Surplus or deficit (−)	−37.4	−29.0	−1.2	37.8	72.7
Percent of GNP:					
Receipts	19.9	20.1	20.9	21.6	21.9
Outlays	21.6	21.2	21.0	20.3	19.7
Surplus or deficit (−)	−1.6	−1.2	(1)	1.2	2.2

[1] Less than 0.05 percent.

Sources: Department of the Treasury and Office of Management and Budget.

A 1983 Federal surplus of that size, combined with a State and local surplus of three-fourths of 1 percent of GNP, would imply an overall government surplus equal to 3 percent of GNP, which is much larger than we have usually seen during periods of high employment. Maintaining a strong growth of economic activity under such circumstances would require a substantially larger excess of private investment over private saving than has been typical of past periods of high employment.

Table 25 shows the balance between investment and saving in the private sector for selected periods of relatively high employment: 1952–53, 1955–56, 1965–66, 1972–73, and the past 2 years. The forecast for 1979–80 is also presented. The difference between private saving and investment in periods of high employment has varied considerably, but the excess of private saving over investment has not been more than 1¼ percent of GNP. A large surplus in the governmental sector would of course provide ample funds for financing investment outlays, and thus tend to encourage a high rate of private invest-

ment. But past experience suggests that an excess of private investment over private saving equal to 3 percent of GNP would not be realized even under the best circumstances.

TABLE 25.—*Private net saving and investment and the unemployment rate, 1952–80*

Period	Personal saving		Business net investment		Excess of business investment over personal saving		Unemployment rate (percent)
	Billions of dollars	Percent of GNP	Billions of dollars	Percent of GNP	Billions of dollars	Percent of GNP	
1952–53 average	16.5	4.6	12.2	3.4	−4.3	−1.2	3.0
1955–56 average	17.3	4.2	20.7	5.1	3.5	.8	4.2
1965–66 average	31.6	4.4	28.3	3.9	−3.3	−.5	4.2
1972–73 average	59.8	4.8	66.4	5.4	6.6	.5	5.2
1977	66.9	3.5	69.2	3.7	2.3	.1	7.0
1978 [1]	76.7	3.6	99.9	4.7	23.2	1.1	6.0
1979–80 average [2]	87	3.6	109	4.4	22	.9	6.1

[1] Preliminary.
[2] Forecast.

Sources: Department of Commerce (Bureau of Economic Analysis), Department of Labor (Bureau of Labor Statistics), and Council of Economic Advisers.

Viewing the issue from a somewhat different vantage point, the rise in Federal tax receipts from 20 percent of GNP in fiscal 1980 to nearly 22 percent 3 years later would represent a record peacetime increase in the burden of taxation on the private economy. Maintaining strong growth in private consumption and investment in the face of such an increased fiscal drag would be virtually impossible. Adjustments of fiscal policy from the current Administration policy budget would be needed to keep the economy moving forward steadily and strongly.

In principle, a lessening of restraint through fiscal policy adjustments could be accomplished either by increasing Federal outlays above the current policy base or by cutting tax rates. Relying mainly on reductions in taxes to promote growth in the private sector would be consistent with the objectives of the Humphrey-Hawkins Act and with the goals of this Administration. It would also prevent tax burdens from reaching an unprecedented level.

The appropriate magnitude and timing of such adjustments cannot, however, be determined now. The fiscal policy needed to maintain a smoothly functioning economy from 1981 through 1983 will depend on spending propensities of consumers and businesses, the amount of stimulus or drag on the economy from the foreign sector as well as from State and local government budgets in those years, developments affecting wages and prices, the course of monetary policy, and so on. The stronger the autonomous growth in the non-Federal sectors of the economy, the smaller the fiscal policy adjustments needed to keep the economy growing along the path

described in Table 22, and the more rapid the progress toward a balanced budget. Achieving a balanced budget is consistent with the principles of the new legislation. But the speed with which that objective can be realized will depend on developments that cannot now be foreseen.

Achieving a balanced Federal budget and at the same time maintaining a high growth rate of real GNP do not appear to be inherently conflicting aims. If the Federal budget were in balance in 1983, the excess of private investment over saving in 1983 would have to be roughly 1 percent of GNP, about equal to the probable magnitude of the State and local surplus. Such a relationship is within the boundaries of historical precedent. It occurred in 1955–56 and again last year. And the forecast for 1979 and 1980 implies a continuation of private investment at a rate that would exceed private saving by only a little less than 1 percent.

Factors Affecting Investment and Saving

Demographic factors are likely to favor relatively strong investment growth over the next 5 years. As noted earlier in this chapter, the postwar baby boom will give rise to very large increases during the next 5 years in the prime home-buying age group (25–34 years). The demand for housing is therefore likely to be robust in the years immediately ahead.

Demographic factors will also work somewhat to keep the personal saving rate low compared to the early 1970s. The 1972–73 Consumer Expenditure Survey data (Table 26) indicate that personal saving rates are about the same between the ages of 25 and 54, but persons in the 55–64 age group save a considerably higher proportion of their income than others. The number of people in this age group will be rising at a much slower rate than the 1.5 percent average increase for the group aged 20 and over. Moreover, the group aged 65 and over will be growing somewhat more rapidly than the average, and the typical saving rate for this group is comparatively low. It is true that the population under 25 will be declining during the next 5 years, and households with heads under 25 tend to be dissavers. But the proportion of total income and saving accounted for by this group is not large.

TABLE 26.—*Saving rate and population growth, by age of household head*

[Percent]

Age of household head (years)	Saving rate,[1] 1972-73	Distribution of disposable personal income, 1972-73	Projected annual population growth rate, 1980 to 1985
Under 25	−6.9	5.3	−0.3
25–34	9.4	20.4	1.8
35–44	9.7	21.0	4.1
45–54	9.2	24.5	−.2
55–64	11.2	17.0	.5
65 and over	6.1	11.8	1.8

[1] Saving as percent of disposable personal income.

Sources: Department of Commerce (Bureau of the Census) and Department of Labor (Bureau of Labor Statistics).

A substantial increase in business investment in the period ahead would be required to improve productivity. Growth in the ratio of capital to labor inputs has been declining since the late 1960s; in recent years, in fact, the ratio of capital to labor inputs has not increased at all: the labor force has expanded rapidly while growth in the capital stock has slowed. This decline in capital intensity has been one cause of the lower rate of productivity growth typical of this period. Over the next 5 years, business fixed investment will have to increase rapidly if the aggregate capital-to-labor ratio is not to fall even further.

High investment requirements do not, of course, translate directly into incentives for businesses to press forward with investment programs to ensure satisfactory growth in the stock of capital. Making certain that the incentives to invest in plant and equipment will encourage the needed rate of capital expansion must be a fundamental aim of economic policy. Policies toward this end are discussed more fully later in this chapter.

Perhaps the most important single contribution to this objective would be lower inflation. Expectations that the inflation rate will decline steadily over the next 5 years would directly attack one of the obstacles to the recovery in business investment, since the uncertainty faced by business has been an important deterrent to investment planning. Indirectly, reduced inflation would have even larger effects on financial markets. With declining inflation, we could look forward confidently to a marked fall in short- and long-term interest rates, to strongly rising stock prices, and hence to a reduction in the cost of both debt and equity capital. Thus, if inflation can be steadily reduced over the next 5 years, prospects would be much improved for achieving a healthy growth in business investment.

ATTAINING THE GOALS FOR UNEMPLOYMENT AND INFLATION

The most difficult problem we as a Nation will face in reaching the goals of the Humphrey-Hawkins legislation is to reduce unemployment to 4 percent and simultaneously lower the rate of inflation to 3 percent. Although our economy was operating at a level somewhat below potential in 1978, intensified pressures on wage rates and prices have already appeared.

The Humphrey-Hawkins Act recognizes that we cannot reach the goals for unemployment and inflation simultaneously by relying solely on monetary and fiscal policies. The Administration shares this view. As Chapter 2 indicated, the anti-inflation program announced by the President on October 24 is based on the premise that braking the momentum of inflation will require widespread compliance by business and labor in reducing the rate of private price and wage increases. Success in that endeavor is critical to our ability to attain the unemployment goals of the Humphrey-Hawkins Act as well as the inflation goal. As noted earlier, continuation of inflation at a high rate could seriously jeopardize the prospects for maintaining a strong economy.

Unwinding the inflation inherited from the past will not remove the risk that new inflationary forces might develop in the future. Prudent fiscal and monetary policies will be needed to avoid an emergence of excess demand. Improved structural policies will also be required. It will be particularly important to find ways to curb the inflationary effects of substantial future reductions in unemployment from present levels.

The current structure of labor markets in our economy makes it especially hard to reach 4 percent unemployment and reduce inflation substantially at the same time. Unemployment varies widely across demographic groups. Measures to address the structural sources of unemployment have been an ingredient of government economic policies for more than a decade, but differential unemployment ratios among groups in the labor force are greater today than they were 10 years ago. Unless these differentials can be reduced, the prospects are dim for making substantial further reductions in the unemployment rate without creating additional inflationary pressures.

The uneven incidence of unemployment among groups in the labor force is shown in Table 27 for the fourth quarter of 1978 and the fourth quarter of 1972. In the earlier period the unemployment rate for adult white males (aged 20 and over), the most experienced group of workers in the labor force, was about the same as it was in late 1978. Over the past 6 years the unemployment rate for almost every other group has risen relative to the rate for adult white males. This widening of unemployment rate differentials has been caused in part by the fact that other groups, which have relatively high unemployment rates, are growing faster as a share of the labor force than adult white males.

TABLE 27.—*Selected unemployment rates, fourth quarter 1972 and fourth quarter 1978*

[Percent; seasonally adjusted]

Group	1972 IV	1978 IV
All civilian workers	5.3	5.8
White 20 years and over	3.9	4.1
Males	3.4	3.5
Females	4.7	5.0
Black and other 20 years and over	7.3	9.2
Males	6.0	8.3
Females	8.9	10.2
Teenagers (16–19 years)	15.7	16.3
White	13.3	14.0
Black and other	35.4	35.3
Males 20 years and over	3.7	4.0
Females 20 years and over	5.2	5.8
Veterans 20–34 years	6.1	5.0
Both sexes 55 years and over	3.1	2.9

Source: Department of Labor, Bureau of Labor Statistics.

In well-functioning labor markets some differences among the unemployment rates of various demographic groups can always be expected.

Teenagers and young adults tend to change jobs more frequently than older workers as they try new occupations and search for long-term careers. Short spells of unemployment when they first enter the labor market or while they look for better jobs keep their overall unemployment rate above the average for older workers. Women, particularly during child-bearing years, tend to move into and out of the labor market more frequently than men.

The proportion of women and teenagers in the labor force has grown substantially since the earlier postwar years, and both of these groups have higher unemployment rates than average. In 1956 the overall unemployment rate was 4.1 percent. If the unemployment rates of each of the various age and sex groups in the labor force today were the same as in 1956, the overall rate would be 4.6 percent. Changes in the demographic composition of the labor force since 1956 have thus added about one-half of 1 percentage point to the unemployment rate. Between now and 1983 the structure of the labor force is likely to change somewhat, bringing a lower proportion of teenagers and a higher proportion of women. However, the effect of this change on the overall unemployment rate will not be large. If unemployment rates of each major demographic group in 1983 were the same as in 1956, the overall rate in 1983 would still be 4.6 percent. Achieving an overall unemployment rate of 4 percent at any time within the next 5 years would therefore require that the jobless rates of many groups within the labor force be brought well below the levels associated with full employment in earlier years.

Although part of the difference in unemployment rates can be explained by differences in voluntary job turnover and entry and reentry into the labor market, major structural obstacles also confront many groups of workers—especially, but not exclusively, minorities. Many potential imbalances in labor markets disappear as workers move from sectors offering relatively poor prospects for employment and earnings to sectors offering better opportunities. But in many instances this process may be blocked by the difficulty of acquiring skills, wage rigidities that discourage employers from hiring less productive workers, and various sorts of discrimination. As pointed out in Chapter 2, the structural rigidities and uneven incidence of unemployment make it very hard under current circumstances to reduce the overall rate of unemployment substantially below the present level without encountering labor shortages in some markets. As the overall unemployment rate declines, demand for skilled, prime-age workers exceeds supply of those workers and puts upward pressure on their wages, even though unemployment among minorities, teenagers, and women may remain unacceptably high. The inflationary pressures in the tight labor markets carry over into the rest of the economy, contributing to general inflation.

Chapter 2 also noted that improvements in various income maintenance programs may have increased the time during which individuals search for

better jobs, thus raising the unemployment rate associated with excess demand in labor markets. The primary focus of labor market policies in the United States has been on manpower training programs, public service employment, and the provision of labor market information. This Administration has maintained a strong emphasis on these traditional programs, but it has also provided resources for new programs aimed specifically at creating work and training opportunities for youths and the poor.

Achievement of substantially lower rates of overall unemployment in a noninflationary environment will hinge on whether governmental policies can effectively reduce the structural sources of unemployment. Toward that end the Administration is pursuing several strategies.

First, strong efforts are being made to target public service employment programs and to reduce the degree of substitution. In the past, the net employment gains attributable to public service employment programs have been considerably smaller than the number of available jobs because some government units used funds from that source to pay for work that would have been done in any case. Amendments to the Comprehensive Employment and Training Act (CETA) in late 1976 were designed to direct public service jobs more effectively toward the unemployed. As the number of these jobs was expanded in 1977 and early 1978, the Department of Labor took steps to create as many net new jobs as possible with available funds, and to eliminate fraud in the program. In 1978 a new structural employment component was added under Title II of the act, establishing a category of public service jobs specially targeted for the disadvantaged and the long-term unemployed. Under the new Title II program, State and local governments are prohibited from supplementing the wages of public service employees.

During 1977 and 1978 the Administration emphasized the use of public service jobs to promote recovery. With the economy now closer to high employment, the Federal budget for 1980 provides funds to support 467,000 public service jobs under CETA at the end of fiscal 1980. An increased share of the jobs, however, are being designated for the structurally unemployed under Title II. The more specific targeting and the prohibition of supplementation should improve the net job-creating impact of the program.

Second, in 1979 the Administration will propose a major incremental welfare reform plan. If enacted promptly, this plan will be fully effective in fiscal 1982. The Administration's plan will reform cash assistance programs and further develop the use of CETA to combat structural unemployment. The plan will expand Title II of CETA and direct more of the jobs to principal earners in families eligible for cash assistance. The exact number of new Title II jobs in 1982 will depend in part on what we learn about CETA in the next 2 years and in part on the budgetary and economic situation in 1982.

Third, special employment programs that are established for youths under the Youth Employment and Demonstration Projects Act and other legisla-

tion will continue to pay particular attention to the needs of the disadvantaged. Total funding for these programs in fiscal 1980 will be held constant at the fiscal 1979 level.

Fourth, the Administration has devoted substantial new resources in 1979 and 1980 to promoting employment opportunities for the disadvantaged in the private sector. As requested by the President, the 1978 CETA legislation provides authority for a special private sector employment and training initiative that will finance 10,000 new job training slots in private business. Under this program, private business will join with the Federal Government, State and local CETA programs, and the U.S. Employment Service to increase permanent private sector jobs for the disadvantaged. In addition, funding is being sought to create about 500,000 opportunities for training and work experience that will be available to the disadvantaged under other parts of CETA. The targeted employment tax credit, which was enacted in the Revenue Act of 1978, provides an income tax credit of 50 percent of the first $6,000 of wages in the first year of employment and 25 percent in the second to encourage the employment of disadvantaged persons, particularly youths between the ages of 18 and 24. Although this approach to structural unemployment is new to the United States, selective employment subsidies have been tried in a number of European countries, including France, West Germany, Sweden, and the United Kingdom.

In various ways these programs directed toward the problem of structural unemployment can reduce the labor market shortages and inflationary pressures that would otherwise be associated with achieving a low overall rate of unemployment. To the extent that training programs provide skills for disadvantaged groups, they increase the supply of workers available to fill some of the skilled and semiskilled jobs that are created in a rapidly growing economy. Evaluations of the success of Federal training programs for the disadvantaged provide mixed results. But there is some evidence that training programs increase the employability and earning power of trainees by an amount that exceeds the cost of the programs. The extent to which these programs could be expanded significantly and still retain their effectiveness is uncertain.

Public service employment programs can in principle help the unemployment-inflation tradeoff. If carefully concentrated on the structurally unemployed, they can add to total employment without substantially increasing upward wage pressures in the labor market. And to the extent that they inculcate better working habits and skills among those who would otherwise be chronically unemployed, they act as a training program with the advantages described above. But several limitations restrict the usefulness of public service employment in dealing with the unemployment-inflation tradeoff. In periods of tight labor markets—when the tradeoff problem is most serious—a public service jobs program that pays relatively attractive wages may encourage workers who would otherwise be available for private

employment to take public service jobs, thereby adding to upward wage pressures. On the other hand, if public service jobs paid relatively low wages they might attract very few workers during periods of tight labor markets. While carefully designed public service employment programs can help provide jobs to the disadvantaged, reduction of structural unemployment by enough to achieve the Humphrey-Hawkins unemployment and inflation goals will require the use of other programs as well.

The more recent additions to our armory of weapons against structural unemployment are the special private sector employment initiative and the targeted tax credit. These have the advantage of directing the structurally unemployed to the private sector where the bulk of new jobs will be forthcoming. They may make an important contribution to improving the trade-off between unemployment and inflation, but they are too new to have been fully evaluated.

Industrial Capacity and Sectoral Problems

At the present time the utilization of industrial capacity is below, but not far below, the peak levels reached in 1973. At that time pressure on capacity, especially in raw materials industries, began to develop, adding to inflationary pressures. To avoid similar problems in the future, industrial capacity over the next 5 years would have to expand about as fast as output.

Last year the Council of Economic Advisers investigated the relation between output, investment, and capacity expansion. The conclusion was that a fairly rapid expansion of output—4.8 percent a year between 1977 and 1981—would raise the capacity utilization rate. The rate would remain, however, below inflationary levels if there were a substantial expansion of investment similar to that in 1962–66, when both capacity and output grew rapidly. In 1979 and 1980, the growth of output is forecast to be slower than in 1978. Capacity utilization over the next 2 years is therefore unlikely to rise, and it might fall somewhat. As a consequence, there appears to be little risk of widespread major capacity shortages in this period. But in the subsequent 3 years, achievement of the Humphrey-Hawkins goals for unemployment would require growth in output averaging about 4½ percent a year, or only slightly below the 4.8 percent growth rate analyzed in last year's capacity utilization study.

In general, therefore, the conclusions reached in last year's study are applicable to the 1981–83 period. If real GNP grew at a 4½ percent average rate, a rapid growth in investment would be necessary to hold the capacity utilization ratio to levels that did not threaten inflation.

An earlier section of this chapter discussed the relationships between saving, investment, and the government budget that would be needed to achieve the Humphrey-Hawkins goals for output and employment and still move toward a balanced Federal budget. The analysis showed that a substantial expansion in private investment relative to private saving would be needed. Investment would have to grow at rates approximating those of

the 1962–66 period—a difficult but not unattainable goal. If that occurs, the requisite capacity expansion would be forthcoming.

There are other ways in which aggregate demand could expand rapidly in the 1981–83 period. Large consumption-oriented tax cuts, for example, would result in a faster expansion of consumer outlays but a slower growth in private investment than if tax cuts were oriented more toward stimulating capital formation. Consumption-led growth would create a danger that capacity would not expand fast enough to avoid inflationary pressures. Such an outcome would not only defeat the Humphrey-Hawkins goal of reducing inflation, but also threaten the possibility of maintaining satisfactory economic growth and achieving a substantial reduction in the rate of unemployment.

SUMMARY

The aspects of economic performance that are critical for the achievement of our longer-run economic objectives were discussed above. Growth in aggregate demand sufficient to reduce unemployment to the levels set forth in the act would require fiscal policy adjustments after 1980, which could be accomplished within the framework of balancing the budget and reducing Federal outlays as a share of GNP by reducing taxes. A strong growth in private investment would be needed. Business investment would have to be particularly strong, but not out of line with performance during other times in the postwar period. Without progress in reducing inflation, however, this outcome is unlikely to be realized.

The most difficult obstacle to achieving the 1983 goals arises from the potential inconsistency between the objectives for growth and unemployment and the need to reduce inflation. Aggregate demand policies must be framed to take this problem into account. Economic policies for the next 2 years are designed to avoid any acceleration of inflation from the demand side, and to use macroeconomic instruments together with the pay and price standards to unwind the inflation inherited from the past. It is clear, however, that the task of reducing inflation to an acceptable pace will not be completed by 1980. We should not commit ourselves now to highly stimulative macroeconomic policies in the years after 1980; to do so might result in an acceleration of inflation, thereby threatening the maintenance of stable economic growth.

Our prospects for achieving the 1983 goals depend upon finding ways to reduce the divergence of unemployment rates among various demographic groups. With the current structure of labor markets, reducing the overall unemployment rate to 4 percent, and the unemployment rate for adults to 3 percent, would require that unemployment rates for experienced adult workers be brought down to extremely low levels. There would be a very substantial excess demand for those workers, giving rise to inflationary wage and price increases. The Federal Government has a number of programs in place,

and is inaugurating several new ones, aimed at reducing structural unemployment. At the present time, however, we cannot be sure that continuing or even rapidly expanding these programs would make possible an overall 4 percent unemployment rate without accelerating inflation. Much work needs to be done to improve existing employment programs and discover new approaches to structural problems if the goals of the act are to be realized.

INVESTMENT POLICY REPORT

The Humphrey-Hawkins Act puts considerable emphasis on the importance of capital formation in achieving our national economic goals. One of its requirements is the inclusion of an Investment Policy Report in this *Economic Report.*

Private investment during the coming years will play two important roles in shaping economic developments. A strong rise in business fixed investment will be required to achieve sustained economic growth and declining unemployment. Substantial growth in the capital stock will also be needed to expand our capacity to produce. Only by devoting a significant share of current production to replace, modernize, and expand the capital stock can we hope to maintain adequate growth in productivity.

Growth in the capital stock will be of strategic importance in particular sectors of the economy. If growth of productive capacity were to lag in sectors producing supplies that were of critical importance in other industries, bottlenecks would develop, restricting overall growth and adding significantly to inflationary pressures in periods of high demand. This is particularly true of the basic materials and energy-producing industries where substitutes, exclusive of imports, may be difficult to find.

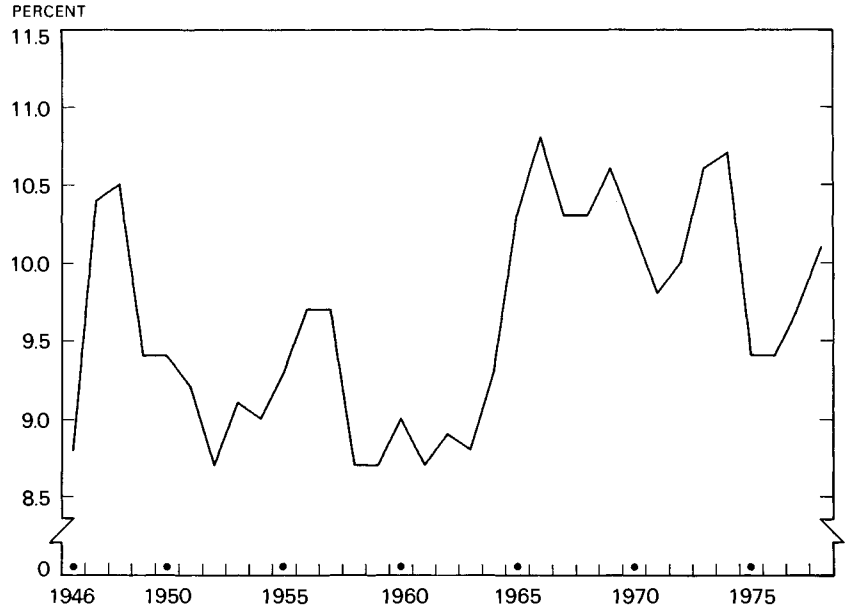
Our competitive position in world markets will also depend heavily on whether or not business fixed investment grows at an adequate pace. Most other industrial countries devote a larger share of output to investment than the United States does, and their growth rates of productivity have also been higher than ours. Increasing the growth of productivity in the United States would help significantly to improve the outlook for our foreign trade balance and to strengthen the dollar in foreign exchange markets.

POSTWAR TRENDS IN INVESTMENT AND CAPITAL FORMATION

Business fixed investment has been quite volatile historically—fluctuating in absolute level and as a percentage of GNP in response to a number of factors: prospects for future output growth and profits, the degree of uncertainty about the future, growth rates of population and the labor force, relative costs of capital and labor, and the speed of innovation. As shown in Chart 8, business fixed investment since 1946 has ranged between 8½ and 11 percent of real GNP. Although there is no obvious sustained trend in this ratio, it tended to hover close to 9 percent in the 1950s and early 1960s, and then moved somewhat above 10 percent from 1965 to 1974.

Chart 8

Real Nonresidential Fixed Investment as Percent of Real GNP



SOURCE: DEPARTMENT OF COMMERCE.

The recovery of investment from the 1974–75 recession was slow. The 9.7 percent investment share for 1977, the third year of recovery, was only midway between the low of 8.7 percent registered in 1952, 1958, 1959, and 1961 (all but 1952 being recession years), and the high of 10.8 percent scored in 1966. Last year investment regained a 10 percent share of GNP.

If a rough estimate of the investment contributed by the public sector is added to private investment, the investment share of GNP is increased. Although differences in statistical measurement and in industry structure make international comparisons imprecise, the evidence (Table 28) suggests that the share of investment in gross domestic product is lower in the United States than in other industrial countries. In the years following World War II such differences were explainable by the need in Japan and in European countries to replace productive capital destroyed in the war. More than 30 years after the war, this explanation can no longer be valid.

International comparisons are not the only, or even the most important, indicator of the adequacy of investment. Achieving the objectives of the Humphrey-Hawkins Act over the next 5 years would require strong investment to support the expansion of private demand, to equip an increasing number of workers, to improve productivity growth, and to meet environmental and social goals. The precise amount of capital required to equip a

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TABLE 28.—*Real nonresidential fixed investment as percent of real gross domestic product, 1966–76*

Country	Percent of GDP
United States	13.5
Canada	17.2
France[1]	16.7
West Germany	17.4
Japan	26.4
United Kingdom	14.9

[1] 1970–75.

Note.—Data are on an OECD basis.

Source: Organization for Economic Cooperation and Development.

worker is, of course, variable. Alternative technologies exist or can be devised to produce the same output with differing ratios of capital to labor, and shifts between industries can also change the overall ratio, since capital-labor ratios differ across industries. Because growth in the civilian labor force over the past decade has been more rapid than in the preceding 10 years (28 percent compared to 16 percent), an acceleration in investment would have been needed to maintain the rise in the capital-labor ratio achieved earlier. More rapid growth of employment in less capital-intensive sectors (government, trade, finance, insurance and real estate, and some services) than in manufacturing, utilities, communication, and transportation, however, has perhaps reduced the need for this acceleration.

The capital-labor ratio has typically shown a long secular upward trend in all the major industrial countries. This has coincided with improvements in the health and education of the work force and substantial technological change. The precise roles and interactions between these forces in contributing to the secular growth in productivity remain subject to considerable debate and are difficult to verify quantitatively. It is worth noting, however, that the U.S. capital-labor ratio grew at an average annual rate of nearly 3 percent between 1948 and 1973. Since then the growth of this ratio has declined more than 1 percentage point. These developments coincided with a decline in the trend rate of growth of productivity in the private nonfarm economy from 3 percent between 1948 and 1973 to under 1½ percent over the past 5 years. Restoring the earlier trend in the ratio of capital to labor input would make an important contribution to greater productivity growth, but such an increase will require devoting a larger share of our national output to business investment than has been characteristic of recent years.

A number of other considerations suggest that society would benefit from stronger investment than has occurred in much of the recent past. To expand our production of domestic energy, at least in part from new sources, will require large outlays at some future time. In addition, society is demanding protection from environmental pollution, occupational hazards, and product

deficiencies. Achieving these social goals, which are not part of output as conventionally measured, entails additional investment. Business expenditures for pollution abatement have risen to a significant fraction of total business fixed investment in recent years, an estimated 5 percent in 1977 and 4.7 percent of total planned investment in 1978. Table 29 illustrates the substantial variation among industries in these outlays. For some, the percentage of total investment is more than twice the national average. Investments for pollution abatement and other social objectives may, to some degree, displace investment that would expand capacity. Consequently higher total investment will be needed if we are to meet both output goals and social objectives.

TABLE 29.—*Capital expenditures by business for pollution abatement, by industry, 1976–78*

[Percent of total capital outlays by business]

Industry	1976	1977	1978 planned			
			Total	Air	Water	Solid waste
All industries	5.6	5.1	4.7	2.4	1.9	0.4
Manufacturing	8.3	7.0	6.2	2.9	2.8	.5
Durable goods	6.6	5.9	5.5	3.0	2.1	.3
Primary metals	15.7	15.7	14.4	9.4	4.6	.5
Electrical machinery	5.6	3.4	3.4	1.1	1.9	.4
Machinery, except electrical	1.6	1.8	1.8	.7	1.0	.1
Transportation equipment	3.4	3.1	4.0	1.5	1.9	.6
Stone, clay, and glass	6.1	7.3	7.3	4.9	2.1	.3
Other durables	3.9	3.6	2.9	1.3	1.4	.1
Nondurable goods	9.6	8.0	6.8	2.7	3.4	.6
Food, including beverage	4.5	4.2	4.7	1.7	2.5	.5
Textiles	4.4	3.8	3.5	1.0	1.9	.7
Paper	14.7	13.8	9.6	3.6	5.3	.7
Chemicals	11.4	10.2	9.2	3.5	5.1	.7
Petroleum	10.9	8.2	7.0	3.0	3.3	.8
Rubber	3.4	3.3	3.0	1.9	1.0	.1
Other nondurables	1.4	1.2	1.0	.6	.3	.1
Nonmanufacturing	3.5	3.5	3.6	2.1	1.2	.3
Mining	2.2	2.2	3.1	1.1	1.0	.9
Railroad	1.1	1.0	1.4	.0	1.3	.0
Air transportation	1.2	.8	.9	.6	.2	.0
Other transportation	1.1	1.0	.9	.2	.6	.1
Public utilities	9.1	8.8	8.7	5.4	2.8	.5
Communication, commercial, and other [1]	.5	.5	.5	.2	.2	.1

[1] Consists of communication, trade, service, construction, finance, and insurance.

Note.—Excludes agricultural business; real estate; medical, legal, educational and cultural services; and nonprofit organizations. Pollution abatement operating costs are also excluded.

Data for 1976 are based on the survey conducted in November and December 1976. Data for 1977 and 1978 are based on the survey conducted in November and December 1977.

Source: Department of Commerce, Bureau of Economic Analysis.

INVESTMENT INCENTIVES

The most important inducement for investors is the prospect of future profits from future sales. These profits may come from increased sales activity, reductions in production costs, or improvements that allow a higher price for the product or attract more buyers of the product. The principal

indicators of the profitability of investment are the rate of growth of output, the percentage of current capacity that is utilized, and the rate of return on the existing capital stock. Costs of investment are also important, of course. These include the price of physical units of capital and the costs of financing investments. Financing costs depend on the after-tax real rate of return required in capital markets by those who provide funds for investment. Various measures are used for this required rate of return. One is the long-term corporate bond rate, adjusted for inflation. The required rate of return could, alternatively, be captured by the earnings-price ratio in the stock market. The price of physical capital and the effective rate of return required by investors can be combined into a single measure, the ratio of the stock market value to the replacement cost of corporate net assets. When investors' required rate of return rises relative to firms' current earnings, the market value of corporate stock declines relative to its replacement cost. Some of the major measures of the profitability and cost of investment are summarized in Table 30.

TABLE 30.—*Determinants of business fixed investment, 1955–78*

[Percent]

Year	Ratio of real investment to real GNP	Capacity utilization rate in manufacturing [1]	Nonfinancial corporations			
			Cash flow as percent of GNP [2]	Rate of return on depreciable assets [3]	Rate of return on stockholders' equity [4]	Ratio of market value to replacement cost of net assets [5]
1955	9.3	87.0	9.3	15.0	6.0	0.932
1956	9.7	86.1	8.9	13.2	5.2	.921
1957	9.7	83.6	8.9	11.6	4.9	.853
1958	8.7	75.0	8.6	9.5	3.8	.874
1959	8.7	81.6	9.2	12.2	4.8	1.044
1960	9.0	80.1	8.9	11.1	5.0	1.019
1961	8.7	77.3	8.8	11.0	4.4	1.147
1962	8.9	81.4	9.4	12.7	5.8	1.092
1963	8.8	83.5	9.6	13.6	6.3	1.204
1964	9.3	85.7	10.0	14.8	7.5	1.295
1965	10.3	89.5	10.4	16.3	9.0	1.360
1966	10.8	91.1	10.3	16.2	8.8	1.205
1967	10.3	86.9	9.9	14.2	7.7	1.217
1968	10.3	87.0	9.4	14.2	7.6	1.257
1969	10.6	86.2	8.6	12.8	6.9	1.124
1970	10.2	79.2	7.9	10.1	4.4	.911
1971	9.8	78.0	8.2	10.3	5.2	1.000
1972	10.0	83.1	8.6	11.5	6.4	1.076
1973	10.6	87.5	8.0	12.3	8.7	1.016
1974	10.7	84.2	6.9	11.4	8.4	.756
1975	9.4	73.6	8.7	9.3	5.2	.725
1976	9.4	80.2	9.1	10.4	4.8	.825
1977	9.7	82.4	9.0	10.6	6.2	.768
1978 [6]	10.1	84.2	9.9	10.6	8.9	.703
1962–66 average	9.6	86.2	9.9	14.7	7.5	1.231
1955–70 average	9.6	83.8	9.3	13.0	6.1	1.091

[1] Federal Reserve Board index.
[2] Cash flow calculated as after-tax profits plus capital consumption allowance plus inventory valuation adjustment.
[3] Profits before taxes plus capital consumption adjustment plus net interest paid divided by the stock of depreciable assets valued at current replacement cost.
[4] After-tax profits corrected for inflation effects divided by net worth (physical capital component valued at current replacement cost).
[5] Equity plus interest-bearing debt divided by current replacement cost of net assets.
[6] Preliminary.

Sources: Department of Commerce (Bureau of Economic Analysis), Board of Governors of the Federal Reserve System, and Council of Economic Advisers.

A year ago the *Economic Report* noted that the 1974–75 recession and the period of price controls in 1971–73 had severely depressed investment incentives. As was also noted, measures of investment incentives were recovering, and continued expansion and rising utilization rates held the promise of further improvement.

Table 30 presents preliminary data for 1978 indicating substantial further gains in capacity utilization and in the rate of return on stockholders' equity. The latter measure, the ratio of after-tax economic profits to net worth, was boosted by the effect of inflation in reducing the real burden of corporate debt. Furthermore, the improvement in the rate of return on stockholders' equity relative to earlier periods partly reflects a shift in the structure of corporate financing of investment from equity to debt issues.

The rate of return on all depreciable assets (profits before tax plus capital consumption adjustments and interest paid) maintained the level it had achieved in 1977 but did not increase further. The rate of corporate cash flow was slightly depressed because profit growth slowed somewhat; although profits measured in book value terms were strong, a significant part of this strength was attributable to capital gains on inventories and to underestimation of depreciation, both resulting from the increase in inflation.

The weakest of the determinants of investment in 1978 was the ratio of market value to replacement cost of capital, which fell in response to the weakness in stock prices. Equity values have risen relatively little during this cyclical recovery for many reasons: uncertainties engendered by the depth of the 1974–75 recession, the sharp disruption caused by higher energy costs, fluctuations in the exchange value of the dollar, and a volatile inflation rate.

Of the four measures of profitability shown in Table 30, only one, the rate of return on stockholders' equity, has regained the 1955–70 average. The other three are well below the 1955–70 average and still further below the average for 1962–66, when investment outlays rose very strongly.

In view of the possible increase in the perceived risks of investment since the early 1970s, one might surmise that businesses have begun to respond differently to the usual measures of investment incentives. During the past year the Council of Economic Advisers extended its earlier analysis of this subject. Economists have suggested several alternative formulations, or models, of the determination of investment, which emphasize to various degrees the influence on investment of growth of output, variations in capacity utilization, changes in cash flow and in the rental price of capital, and the ratio between the market value of capital and its replacement cost. All involve substantial margins of error.

The Council has not attempted to choose between these different formulations. It has tested, for each model, whether the statistical relation between investment and those factors that determine investment in the model differ significantly in the various periods covered by the examination.

This analysis suggests that the behavior of investment in equipment has not changed significantly during the years since 1973 in comparison with

earlier years. Variations from year to year in the strength of investment in equipment, relative to the forces expected to determine it, have remained within the normal margin of error. Indeed, if there has been any point in recent years at which the pattern of investment in equipment seems to have changed, the most likely time would have been in 1968–69. This period also marked the beginning of a slowdown in the growth of the capital-labor ratio.

Most formulations indicate that investment in structures was unusually slow following the 1974–75 recession and that the substantial recovery last year was not explained by reference to previous relationships. Quite possibly, special factors affecting particular industries may underlie this structural change. For example, early in the recovery the impact of environmental regulations on the steel industry was very heavy at a time when capacity utilization and profits were exceptionally low both here and abroad, and foreign competition was particularly severe. Similarly, uncertainties about energy prices may have had a perverse effect on investment by utilities before the enactment of the energy bill.

This analysis suggests tentatively that some weakening of the demand for equipment may have occurred at the end of the 1960s or early in the 1970s in response to greater perceived risks, and that a variety of special factors may have disrupted the normal pattern of investment in structures. Moreover, as noted above, the profitability of investment has not yet regained the high level prevailing in the early 1960s. If the investment needed to reach our economic goals in 1983 is to be realized, policy actions are required that will strengthen investment incentives and reduce investment costs and risks.

Tax policy is one instrument that can encourage investment by lowering the rental cost of capital, or raising its after-tax rate of return. The Revenue Act of 1978 contained important measures toward achieving this end. The corporate tax rate was reduced by lowering the top rate from 48 percent to 46 percent and by scaling the rate up more gradually, across four brackets instead of two, so that the top rate is paid on earnings over $100,000 rather than $50,000. The act also made the investment tax credit permanent. The limitation on the amount of tax liability that could be offset by the credit is to be raised from 50 to 90 percent by 10 percentage point increments from 1980 to 1982; the credit is extended to cover rehabilitation of nonresidential structures and single-purpose agricultural and horticultural structures; and it is liberalized for certain pollution control facilities. Selected tax treatment of small businesses was also liberalized. Finally, taxes on capital gains were reduced. The proportion of net long-term capital gains that can be excluded from an individual's taxable income was raised from 50 percent to 60 percent. The alternative tax of 25 percent was dropped, and the excluded portion of capital gains will no longer be counted as a preference item subject to the minimum tax. A new alternative minimum tax was introduced, however, with a maximum rate of 25 percent. These changes reduce the effective tax rate on capital gains by about one-third.

All of these tax changes result in a lower rate of taxation on returns to corporate capital—the key sector for productivity-raising investment, since it produces 75 percent of total private output. The corporate rate reduction and the investment tax credit will have the greatest effect because they are concentrated directly on the corporate sector and on the relatively heavily taxed, capital-intensive industries in that sector. The reduction in the capital gains tax may also be helpful in encouraging the supply of risk capital, but lowering capital gains taxes is not an efficient means of promoting investment. Only one-third of taxable capital gains accrue on corporate stock or on assets owned by corporations. Only two-thirds of capital gains accrue on reproducible long-lived assets used in production. The part of the tax advantage that accrues to other sectors (for example, capital gains on land) may have no investment effect. Furthermore, a significant fraction of gains accrue in already lightly taxed industries. As a result, this tax change conflicts with the objective of equalizing taxation across industries and thus distorts the efficiency with which markets allocate resources.

Further tax reductions designed to strengthen investment incentives may well be needed in the years ahead to encourage a high rate of investment in new plant and equipment. Given the budgetary constraints required in the near future to reduce inflation, there is no room for additional tax cuts now. Over the longer term, however, opportunities for further general tax reduction will emerge. As they do, reductions carefully designed to strengthen incentives for business investment should be given high priority.

Other public policies have a substantial influence on investment incentives. Pollution abatement requirements and other forms of social regulation pertaining to health and safety impose costs on private industry—both current operating costs (for example, by requiring extra workers for waste treatment processes) and capital costs (covering such items as extra equipment for safety and pollution control). Industries like steel, coal, chemicals, and electric utilities have been especially affected.

As discussed in Chapter 2, the Administration is working to make the regulatory process more rational. A strong and successful effort in this direction offers promise of reducing significantly the costs of regulation relative to its social benefits. In turn, this should reduce the effective capital costs of investment projects and thereby strengthen investment incentives. Furthermore, removing some of the uncertainty regarding future regulations will facilitate business investment decisions.

Other policy measures should also help to reduce the risks faced by those responsible for making investments. The energy legislation enacted last year will make the relative prices of various types of fuels more predictable. Coordination of Federal efforts to improve productivity is being undertaken by the National Productivity Council, a cabinet-level group. A major effort is also under way to promote more rapid innovation through increased emphasis on research and development.

RESEARCH AND DEVELOPMENT

Research and development expenditures are a form of investment on which the returns are very uncertain, especially in the case of basic research. In some instances society as a whole may benefit from research that adds nothing to an individual investor's profits: for example, when it is discovered that a theory does not work. Moreover the investor is usually unable to capture all of the returns from research even when the results are directly useful. The limited life of a patent and uncertainties about patent rights and the enforcement of patents have deterred investment in research and innovation.

The slow growth of research and development expenditures in this country in recent years may account for a part of the low productivity growth of the 1970s. After correction for inflation, expenditures for research and development in 1975 were only 2.6 percent above their level in 1965. This slow growth was largely due to the decline in space-related research; private expenditures for research and development grew at roughly the same pace as the economy. In contrast to the trend over the past decade, real Federal support for research and development rose by 4.2 percent in 1977 and by 2.6 percent in 1978, while total spending for this purpose increased to 4.4 and 2.8 percent respectively in these 2 years. This amounts to a 2-year gain almost three times as great as the rise in the previous 10 years.

Recognizing the importance of basic research to innovation and the high risks of conducting such research in the private sector, the Administration initiated a significant expansion of obligating authority and outlays for basic research and development in the fiscal 1979 budget. Outlays this year in current dollar terms will rise by almost 18 percent from fiscal 1978 levels, and they are scheduled to increase by an additional 10 percent in fiscal 1980.

The President has also begun a comprehensive interagency review, under the leadership of the Secretary of Commerce, of all Federal policies bearing on the process of industrial innovation. This review will rely on assistance from relevant Federal agencies, representatives from business and labor, and other interested parties. Its scope is not limited to the influence the Federal Government exerts through direct expenditures and grants for research; it will also consider the effect of patent, antitrust, procurement, and other governmental polices that bear indirectly on research and innovation.

THE SUPPLY OF INVESTMENT CAPITAL

The supply of resources available for business fixed investment is limited by the capacity of the economy to produce goods and by the amounts of those goods that are preempted for other public and private uses. When substantial slack remains in the economy, expansion of public spending or private consumption has little or no adverse impact on the supply of investment goods. In fact, an expansion of public spending or consumer demand

is likely under those circumstances to increase investment by improving the perceived profitability of investment.

When the economy is operating close to capacity, however, increases in public demand or private consumption will adversely affect business fixed investment, because prices of capital goods are bid up and the cost of borrowing rises. One aim of Federal policy must be to avoid excess aggregate demand and the inflation and credit market tightness that it generates. A second aim must be to analyze carefully the social costs and benefits of Federal programs, in order to control the share of the Nation's output absorbed by the government. Achieving this goal in the context of favorable tax and monetary policies will help provide the real resources, credit market conditions, and incentives needed for rapid growth of the capital stock.

As the Federal budget is moved toward balance in the context of continued economic expansion, and as growth in the government share of total output is curbed in the years ahead, more resources will be available for business fixed investment. The combination of this fiscal policy with successful steps to reduce inflation will create the environment in which monetary policy can offer more encouragement to investment.

Financial capital in recent years has been available at attractive real interest rates, although nominal rates have remained high. Nonfinancial corporations have raised substantial amounts of funds in credit markets. The ratio of funds raised in credit markets to total capital expenditures began to rise rapidly in late 1976 and reached a peak in the first quarter of last year, after which it tapered off. The 1978 first quarter peak was surpassed historically only in 2 isolated quarters during the 1972–73 investment boom.

A similar pattern appears in the nonfarm, noncorporate sector. For farm business, on the other hand, growth of credit use was more modest than in other sectors during 1977, but it accelerated sharply in the second and third quarters of last year to a pace more than 25 percent above the 1977 average.

These relatively high rates of business credit expansion were facilitated by the steady flows of funds to those financial intermediaries that are important for business lending, particularly life insurance companies and pension funds. Growth in pension fund reserves—a means by which households indirectly provide loans to businesses and governments—rose by a dramatic 46 percent between 1975 and 1977. In the second and third quarters of last year the average growth in these reserves was 8.6 percent above the 1977 pace.

The cost and availability of equity capital are more volatile than is true of debt capital, since they depend on the expectations of the public as reflected in stock prices and on the willingness of private and institutional investors to accept equity market risks. In periods when credit markets are weak, firms may thus be forced to accept a higher debt-equity ratio than they would prefer. This is particularly likely in periods when the flow of internal funds is small relative to desired investment. It probably happens also to firms in cyclically sensitive industries that do not have exceptionally strong growth trends, and to newer businesses that have not yet established strong earnings

records. In 1977 and the first half of 1978, new issues of common and preferred stock accounted for only 23 percent of the gross proceeds of stock and bond issues. The lagging recovery of the stock market during the current expansion is undoubtedly a major reason why this ratio is lower than in the mid-1960s, when stock prices were high.

SMALL BUSINESSES

The availability of capital, and particularly equity capital, to small businesses is a fundamental concern. The data at hand suggest persistently higher debt-equity ratios for small corporations (those with assets under $5 million) manufacturing nondurable goods than for larger ones. For small manufacturers of durable goods the ratio of debt to equity has been higher than for large corporations in all years since 1959, except in the period from 1967 to 1971, when borrowing by large corporations rose sharply.

These higher debt-equity ratios and a corresponding heavier reliance on bank credit are partly due to the fact that small businesses tend to have a higher proportion of assets invested in inventories and a lower proportion in plant and equipment. This, in turn, may be caused by a differing distribution of large and small firms within various industries. It may also, however, be a symptom of imperfections in capital markets that limit the availability of equity capital.

Programs of the Small Business Administration (SBA) are designed to increase the financial capital available to small firms. In 1977 the number of direct loans approved by the SBA rose 25 percent, and the dollar value of new loans rose 70 percent. In addition to the direct loan program, the SBA also licenses, regulates, and provides financial assistance to small business investment companies (SBICs). The privately owned SBICs pool public and private funds in order to provide equity and long-term debt capital to newer small businesses. These latter firms, in contrast to those financed by other SBA programs, tend to operate in new markets or with new technology. At the end of 1977 there were 273 SBICs, making use of $428 million of private capital and $537 million of funds from the SBA. The volume of new financing arranged during fiscal 1977 was $197 million, a 68 percent increase from the preceding year. In order to provide special attention to the needs of businesses owned by socially or economically disadvantaged persons, the SBA administers a parallel program of SBICs for minority enterprises. The volume of loans under this program grew 72 percent in fiscal 1977.