Statement of Alice M. Rivlin Director Congressional Budget Office

before the Committee on the Budget United States Senate

February 15, 1983

There should be no release of this statement before its delivery, scheduled for 10:00 a.m., February 15, 1983

Mr. Chairman, it is a pleasure to appear before this Committee to discuss the economic and budget outlook. My testimony today focuses on several points—the near-term prospects for economic recovery, the uncertainty about how sustainable that recovery will be, and the magnitude and implications of the budget deficits projected under the CBO baseline. I will close with a brief overview of the difficult task at hand and of the Administration's proposal for dealing with it. The Congressional Budget Office (CBO) has just issued its annual report—again this year, in three volumes—with a good deal of detailed analysis in these areas. I/

THE CBO BASELINE ECONOMIC FORECAST AND PROJECTION

The recession in the U.S. economy, which was initiated by high inflation and tight credit conditions, is now the most severe of the post-World War II period. At the same time, though, the inflation picture has improved markedly; the record slack in the U.S. economy, together with a depressed world economy, have sharply reduced inflationary pressures.

A year ago, CBO projected a recovery during 1982, which did not materialize because of very high interest rates in the first half of the year. Beginning last July, however, interest rates fell in response to the weakness of the economy, declining inflationary expectations, and an easing of monetary policy.

^{1.} See Congressional Budget Office, Report to the Senate and House Committees on the Budget as required by Public Law 93-344, The Outlook for Economic Recovery (Part I), Baseline Budget Projections for Fiscal Years 1984-1988 (Part II), and Reducing the Deficit: Spending and Revenue Options (Part III), February 1983.

As a result, CBO and other forecasters are again predicting a recovery; indeed, there now seems to be fairly broad-based evidence of an upturn in the months ahead. The inventory decline appears to be slowing; auto production is rising; a sharp rise in housing starts portends a pick-up in residential construction; and consumers' balance sheets suggest that they are in a position to increase spending. There are, however, reasons to believe that economic growth will not be as vigorous in this recovery as it has been in past recoveries. Interest rates, after adjustment for inflation, remain at historically high levels, and business investment is not expected to pick up for some time. Exports are expected to remain weak both because of the high value of the dollar and because of continued recession abroad.

The CBO short-run forecast reflects the following policy assumptions:

- The tax and spending policies are those that were in effect at the end of the 97th Congress. Defense spending is at a level for fiscal year 1984 that is consistent with the budget resolution for fiscal year 1983.
- o With regard to monetary policy, the broad money aggregate, M2, is assumed to grow at a 9 percent annual rate during 1983 and 1984. If velocity growth deviates sharply from average historical growth rates (as it did during 1982), however, CBO assumes that the Federal Reserve will adjust its money targets in an attempt to ensure moderate growth in nominal GNP.

The short-run forecast also assumes no food or fuel price shocks. 2/ However, an assumed 10 percent to 15 percent decline in the trade-weighted value of the dollar is expected to exert some pressure on prices by raising the costs of imported goods.

^{2.} Food prices are expected to rise moderately during the next two years, by 4 percent this year and 5 percent next year. World oil prices are assumed not to change through 1984.

The CBO short-run baseline economic forecast (see Table I) shows real growth in the gross national product (GNP) of 4.0 percent from the fourth quarter of 1982 to the fourth quarter of 1983, and 4.7 percent in the next year. The unemployment rate is expected to decline gradually, reaching 9.4 percent by the final quarter of 1984. Inflation, as measured by the GNP deflator, deviates little from last year's 4.6 percent (fourth-quarter-to-fourth-quarter). Short-term interest rates, as measured by the three-month Treasury bill rate, are projected to average 6.8 percent in calendar year 1983, rising slightly as the recovery proceeds to 7.4 percent in calendar year 1984.

TABLE 1. THE CBO SHORT-RUN FORECAST

Economic Variable	1981:4 to 1982:4 Actual	1982:4 to 1983:4 Forecast	1983:4 to 1984:4 Forecast
Nominal GNP (percent change)	3.3	8.9	9.6
Real GNP (percent change)	-1.2	4.0	4.7
Inflation (percent change in GNP implicit price deflator)	4.6	4.7	4.6
Unemployment Rate <u>a/</u> (calendar year average)	9.7	10.6	9.8
Interest Rates (three-month Treasury bill rate, calendar year average)	10.6	6.8	7.4

a/ Excludes uniformed military personnel.

For the years after 1984, CBO projections are not a forecast but merely assumptions about attainable average growth and price behavior. Because of the uncertainty in the economic outlook, CBO has prepared projections according to two alternative economic paths, both of which can be compared to the baseline projection (see Table 2). Under the baseline, real GNP is assumed to grow at an annual rate of 3.6 percent, with unemployment declining slowly to 7.5 percent by 1988. Inflation is assumed to decline very gradually to 3.7 percent by 1988. Both short- and long-term interest rates are assumed to drift down slowly in the out-years, though at a somewhat faster pace than the decline in inflation.

The high-growth path shows a "normal" cyclical recovery, with more than 5 percent growth during the first three years and 4 percent thereafter. The low-growth path shows a very weak recovery, with unemployment rates averaging about 10 percent over the 1983-1988 period, but with inflation declining more rapidly.

The CBO and Administration economic assumptions for the fiscal year 1984 budget show the same basic pattern. CBO's projection (shown in Table 3) is somewhat the more optimistic about real growth and inflation during the next two years. After 1984, though, the Administration sees slightly faster growth, a steeper decline in unemployment, and higher inflation.

TABLE 2. CBO BASELINE AND ALTERNATIVE PROJECTIONS, CALENDAR YEARS 1983-1988

Economic Variable	1983	1984	1985	1986	1987	1988				
		СВС) Baseline	Projection	ons					
GNP (percent change)	6.8	9.6	9.0	8.1	7.6	7.4				
Real GNP (percent chang	e) 2.1	4.7	4.1	3.7	3.5	3.5				
CPI-U (percent change)	4.5	5.0	4.7	4.1	3.9	3.7				
Unemployment Rate <u>a</u> / (percent)	10.6	9.8	9.0	8.4	8.0	7.5				
Three-Month Treasury Bi Rate (percent)	11 6.8	7.4	7.2	6.6	6.1	5.9				
	Alternative Projections									
GNP (percent change) High-growth path Low-growth path	9.0 5.4	11.3	9.5 7.9	9.1 7.2	8.9 6.6	9.1 6.4				
Real GNP (percent chang High-growth path Low-growth path	e) 4.0 0.8	6.0 3.3	4.2 3.3	4.0 3.2	4.0 3.0	4.0 3.0				
CPI-U (percent change) High-growth path Low-growth path	4.6 4.5	5.3 4.9	5.0 4.4	4.6 3.8	4.6 3.4	4.8 3.2				
Unemployment Rate <u>a/</u> High-growth path Low-growth path	9.9 11.2	8.5 10.9	7.7 10.3	7.0 9.8	6.4 9.4	6.0 9.0				
Three-Month Treasury Bi. Rate (percent) High-growth path Low-growth path	4.4 8.4	5.4 9.9	5.7 8.9	5.0 7.7	5.0 7.2	4.9 6.3				

a/ Excludes uniformed military personnel.

TABLE 3. COMPARISON OF CBO AND ADMINISTRATION ECONOMIC ASSUMPTIONS

			Ca	lendar	Years			
1982	1983	1984	1985	1986	1987	1988	1982:4 to 1983:4 Forecast	1983:4 to 1984:4 Forecast
Real GNP (percent		<u> </u>						_
change)								
CBO -1.8	2.1	4.7	4.1	3.7	3.5	3.5	4.0	4.7
Administration -1.8	1.4	3.9	4.0	4.0	4.0	4.0	3.1	4.0
GNP Deflator								
(percent change)								
CBO 6.0	4.6	4.7	4.7	4.3	3.9	3.8	4.7	4.7
Administration 6.0	5.2	5.2	4.9	4.6	4.5	4.4	5.6	5.0
CPI-W (percent change)								
CBO 6.0	3.8	4.6	4.4	4.1	3.9	3.7	3.8	4.5
Administration 6.0	4.9	4.6	4.6	4.6	4.5	4.4	5.0	4.4
Unemployment Rate <u>a</u> / (percent)								
CBO 9.7	10.6	9.8	9.0	8.4	8.0	7.5		
Administration 9.7	10.9	10.0	9.0	8.2	7.4	6.6		
Three-Month Treasury- Bill Rate (percent)								
CBO 10.6	6.8	7.4	7.2	6.6	6.1	5.9		
Administration 10.7	8.0	7.9	7.4	6.8	6.5	6.1		

 $[\]underline{\underline{a}}/$ Excludes uniformed military personnel.

THE BUDGET OUTLOOK UNDER CURRENT POLICIES

Although the economy is expected to begin its recovery this year and to move into a period of continued growth, budget projections by both the Administration and the CBO show deficits rising steadily under existing tax laws and spending policies. The extremely large deficits CBO projects (see Figure 1)--rising from \$194 billion in 1983--result primarily from three factors:

- o The current slack in the economy, which reduces revenues in fiscal year 1983;
- o The large tax cuts enacted in 1981 (under the Economic Recovery Tax Act of 1981--ERTA), which reduce revenue growth over the period; and
- o Substantial increases in defense, Social Security, and Medicare and Medicaid spending, and interest costs.

Federal revenues under current law are projected to be \$606 billion in 1983, \$12 billion below the amount collected in 1982 and \$60 billion below the budget resolution target (see Table 4). This decrease lowers the starting point for the 1984-1988 baseline revenue projections.

Revenues are projected in the baseline to resume their growth as the economy recovers but the projected growth in revenues is slightly lower than the assumed average growth in nominal GNP. As a result, baseline revenues as a percentage of GNP are projected to be only 18.3 percent in

Figure 1. CBO Baseline Budget Projections

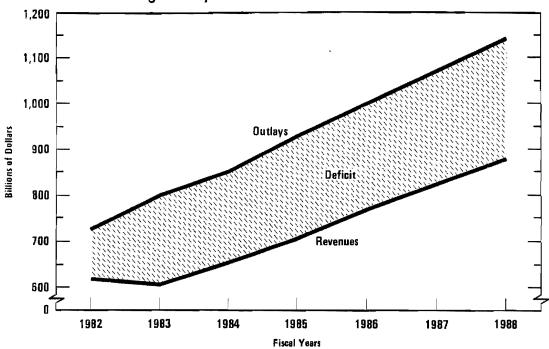


TABLE 4. CBO BASELINE BUDGET PROJECTIONS, FISCAL YEARS 1983-1988

	1982	1983			Projecti	ons	
	Actual	Base	1984	1985	1986	1987	1988
			In B	illions of	Dollars	,	
Revenues Outlays Deficit	618 728 111	606 800 194	653 850 197	715 929 214	768 999 231	822 1,072 250	878 1,145 267
			As a	Percent	of GNF	•	
Revenues Outlays Deficit	20.4 24.0 3.6	19.0 25.0 6.1	18.7 24.3 5.6	18.7 24.3 5.6	18.5 24.1 5.6	18.4 24.0 5.6	18.3 23.9 5.6

TABLE 5. REVENUE EFFECTS OF ERTA AND TEFRA, IN BILLIONS OF DOLLARS AND AS A PERCENT OF GNP, FISCAL YEARS 1983-1988

	1983		P	ns		
	Base	1984	1985	1986	1987	1988
		In	Billions	s of Doll	ars	
Economic Recovery Tax Act of 1981	-88	-135	-167	-205	-236	-267
Tax Equity and Fiscal Responsibility Act of 1982	18	38	42	47	54	56
		As a Percent of GNP				
Economic Recovery Tax Act of 1981	-2.6	-3.9	-4.4	-5.0	-5.3	-5.6
Tax Equity and Fiscal Responsibility Act of 1982	0.6	1.1	1.1	1.1	1.2	1.2

1988--well below the post-World War II high, reached in 1981, of 20.9 percent of GNP. The main reason for the decline in revenues relative to GNP over the 1984-1988 projection period (see Table 5) is the large tax reductions enacted in 1981 (under ERTA), reductions that were only partly offset by 1982 legislation (the Tax Equity and Fiscal Responsibility Act of 1982--TEFRA).

Federal outlays in 1983, on the basis of actions by the 97th Congress, are now estimated to total \$800 billion, or \$30 billion higher than projected by last year's budget resolution. Under CBO's baseline assumptions, which include national defense spending levels consistent with the 1983 budget resolution targets, unified budget outlays would increase to \$850 billion in 1984 and would grow to over \$1.1 trillion by 1988. Relative to GNP, baseline outlays would decline from 25.0 percent in 1983—the highest ratio since World War II—to about 24 percent in 1988, a ratio still higher than for all postwar years up to 1982.

More than 90 percent of the \$345 billion in outlay growth between fiscal years 1983 and 1988 is concentrated in just four areas: national defense, Social Security, Medicare and Medicaid, and net interest costs (see Table 6). These four components will account for 68 percent of total outlays in 1983 and 76 percent of total outlays under CBO's baseline assumptions in 1988.

CBO expects the budget deficit for 1983 to be \$194 billion, almost double the \$104 billion target the Congress set last year in the budget resolution. Under CBO's baseline assumptions, it would remain at about the same level in 1984 and then grow gradually to nearly \$270 billion by 1988. As a percent of GNP, the deficit would decline only slightly from its postwar high of 6.1 percent in 1983 to a relatively steady 5.6 percent over the 1984-1988 period (see Figure 2).

Alternative Economic Assumptions

Projections of the budget deficit are greatly affected by economic assumptions, even with tax and spending policies unchanged (as shown in Appendix Table 1 and Figure 3). But even under the "high growth" economic path, the budget deficit would remain large throughout the projection period.

THE CONSEQUENCES OF CURRENT BUDGET POLICY

Under any of these economic scenarios, the deficits projected for the out-years pose severe risks. One possibility is that the Federal Reserve, facing such large deficits, will not be able to maintain an anti-inflationary monetary policy; as a result, inflation may be rekindled. Alternatively, the

Figure 2. Federal Deficit as a Percentage of GNP

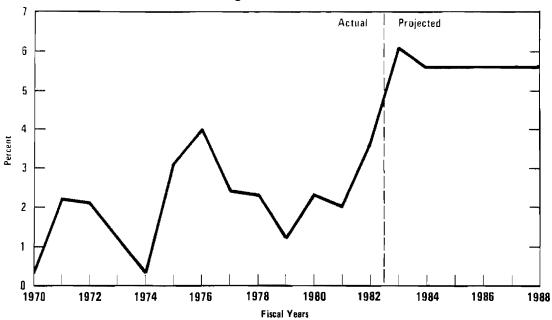


Figure 3.
Federal Deficit Under Alternative Economic Assumptions

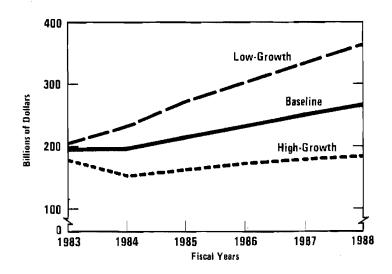


TABLE 6. COMPOSITION AND GROWTH OF FEDERAL OUTLAYS (By fiscal year, in billions of dollars)

	1983 Base	1988 Projection	Change	Cumulative Five-Year Change 1984-88
National Defense	213	358	144	456
Entitlements and Other Mandatory Spending Social Security Benefits Medicare and Medicaid Other Entitlements Subtotal	168 76 142 386	232 142 	64 67 <u>~6</u> 125	186 181 -53 314
Nondefense Discretionary Spending	145	184	39	120
Net Interest	87	134	47	144
Offsetting Receipts	<u>-32</u>	<u>-41</u>	<u>-9</u>	32
Total	800	1,145	345	1,002

normal rise in business and consumer demand for credit during the recovery may collide with large federal credit demands to finance the persistent deficits. The resulting increase in interest rates is likely to crowd out business investment. A low-investment economy reduces the chances for productivity growth. Failure to modernize equipment prevents our export industries from remaining competitive. In the long run, advances in the nation's standard of living rely on the productivity growth and maintenance of trade that deficits jeopardize.

NARROWING BUDGET DEFICITS

Substantial cutbacks in spending or increases in taxes in fiscal years 1983 or 1984 might delay or weaken the economic recovery. However, substantial reductions in the deficit over the entire projection period 1984-1988 are needed if a balanced recovery is to be sustained and the low-investment scenario avoided. This points to the need for a multiyear plan that is devised and legislated this year. Prompt action must be taken both to ensure an orderly reduction in out-year deficits and to reduce the uncertainty about future fiscal policy. Before such a plan is embarked on, two broad policy choices have to be resolved.

The first choice is to settle on a budget deficit target for, say, 1988. That target must be well below the baseline projection of 5 percent to 6 percent of GNP. Most of the responsible debate has centered on a range of target deficits by 1988 of between 1 percent and 3 percent of GNP. And the Administration, as you know, is calling for a deficit target of 2.6 percent of GNP by 1988 (under its economic assumptions).

The second choice is whether the major deficit-narrowing initiatives should emphasize spending cuts or tax increases. Obviously, either of these routes exacts real costs.

ILLUSTRATIVE MULTIYEAR DEFICIT REDUCTION PLANS

To indicate the magnitudes involved in these choices, Part III of CBO's annual report shows three illustrative budgetary plans designed to reduce the deficit gradually to 2 percent of GNP by 1988. The first plan (included here as Figure 4) emphasizes tax increases (raising the tax burden to 21 percent of GNP by 1988) and holding national defense spending to levels consistent with last year's budget resolution. Such an approach would imply a cumulative five-year increase of more than \$300 billion from the new tax initiatives, only about \$60 billion of which would be furnished by enactment of the proposals advanced by the National Commission on Social Security Reform. Raising the additional revenues would require repeal of major provisions of ERTA, adoption of significant new tax sources, or a truly comprehensive broadening of the income tax base (see Appendix Table 2). On the other hand, this illustration would only require about \$70 billion in nondefense spending cuts (over and above the Social Security commission's proposals and the debt service savings made possible from lower deficits) over five years, which is well within the bounds of recent experience. (Appendix Table 2 lists some options.)

Alternatively, if revenues were allowed only to creep back to the current level of 19 percent of GNP, the need for spending reductions would be extreme (see Figure 5). More than \$300 billion in program cuts would be needed over the 1984-1988 period (beyond Social Security reform and interest savings). Curbing defense growth sharply--by holding budget

Figure 4.
Strategy Example 1—Restore Tax Share to 1981 Level,
Maintain Baseline Projection for Defense

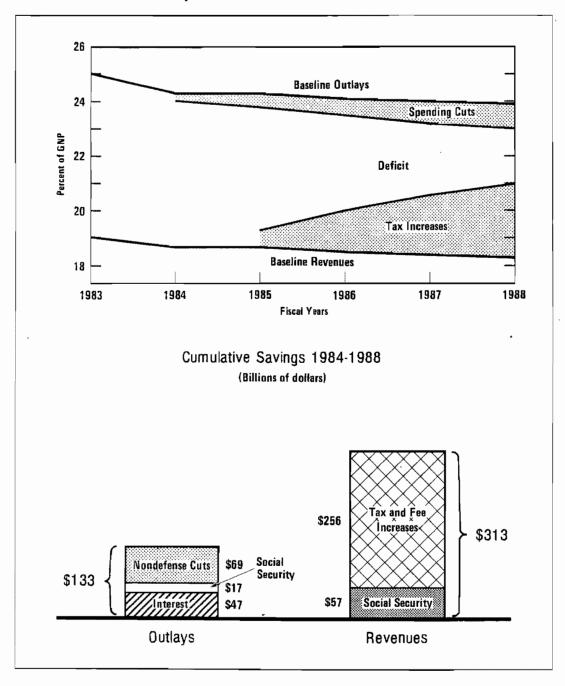
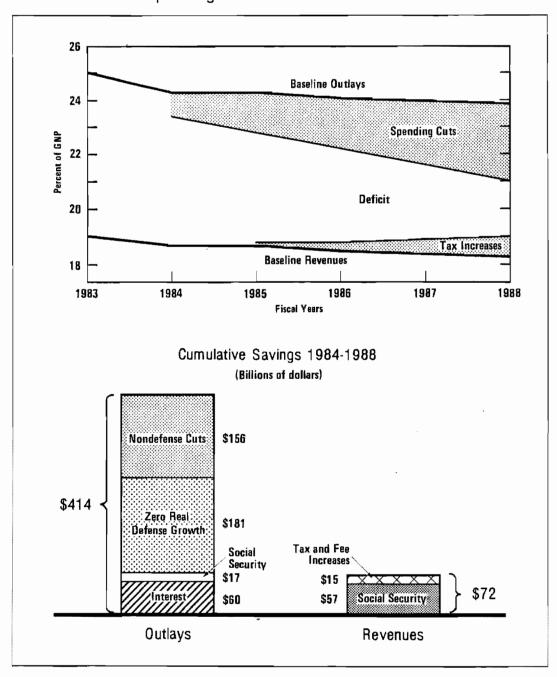


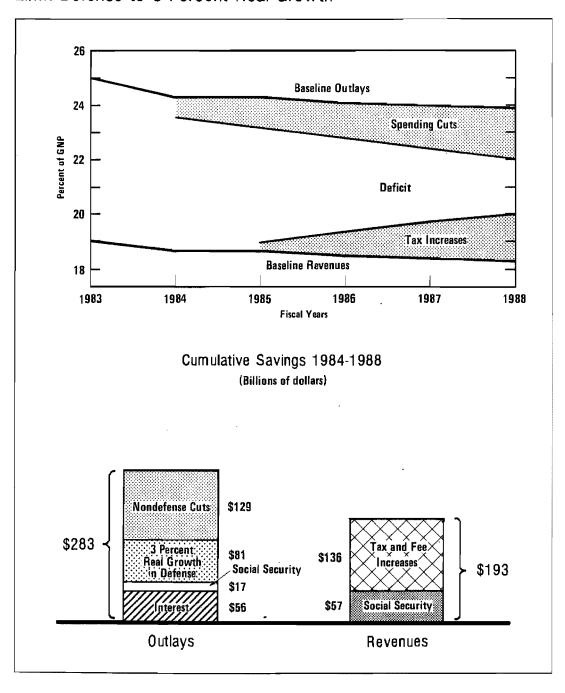
Figure 5.
Strategy Example 2—Freeze Tax Share at 1983 Level, Cut Government Spending



authority for national defense to zero real growth--could furnish almost half of the needed deficit reduction; but that would still leave \$150 billion to be recovered in nondefense cuts. Even if all cost-of-living adjustments in Social Security benefits were held to 2 percentage points below inflation, and if all nondefense discretionary programs were frozen at current levels (both measures assumed effective for five years), the cumulative savings would fall far short of the mark (see Appendix Table 3). Such draconian cuts in domestic programs and reversals of defense growth are unlikely to gain broad support.

A reasonable conclusion to draw from these illustrations is that a deficit reduction plan will have both to raise taxes significantly and make major spending cuts. In one such plan (illustrated in Figure 6) taxes are gradually raised to the intermediate level of 20 percent of GNP, and spending is brought down to 22 percent of GNP in 1988. In this alternative, significant tax and spending legislation would be needed; but some flexibility of choice would be preserved. For example: on the revenue side, repeal of indexing of the individual income tax and a small assortment of basebroadening options could bring taxes up to the required level (see Appendix Table 2). Several alternate outlay packages that accumulate to about \$200 billion in savings (after Social Security and interest savings) could be For example, the figure shows that limiting national defense budget authority growth to 3 percent after inflation would contribute about \$80 billion in savings from the 1984-1988 baseline and several less extreme reductions (in Medicare and other entitlement programs, for example) could supply the rest.

Figure 6.
Strategy Example 3—Raise Tax Share to Intermediate Level, Limit Defense to 3 Percent Real Growth

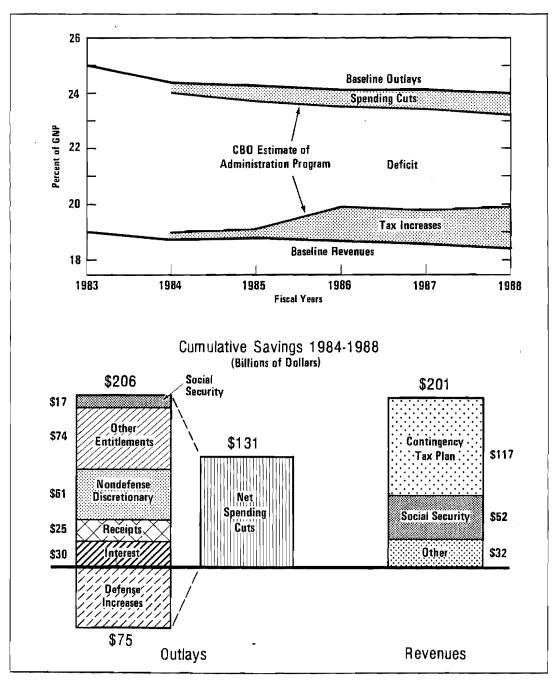


The Administration's Budget Plan

The Administration's recently submitted budget would narrow the deficit by a somewhat smaller amount, and the composition of that budget is strikingly different. The proposal (depicted in Figure 7) includes substantial tax increases, with the tax share estimated by CBO (under our baseline economic assumptions) to rise to 20 percent of GNP in 1988. Most of the new revenue is derived from the contingency tax plan of an income tax surcharge and a petroleum tax. The <u>net</u> outlay reduction in the Administration's program is at the lower end of the range of the alternatives CBO has been illustrating, but the composition of the proposed spending cuts is quite different.

Relative to the CBO baseline projections, the Administration is requesting a substantial increase in defense spending—some \$75 billion over the 1984–1988 period. The defense increase simultaneously raises the gross spending reductions needed, and it restricts cutting to the nondefense side. CBO's estimates indicate that the cumulative reductions in entitlement programs other than Social Security would come to about \$74 billion, and in nondefense discretionary spending to about \$61 billion. These cuts represent more than half of all projected spending growth after 1983 in the CBO baseline for these categories.

Figure 7. Administration's Budget Program



SOURCE: Congressional Budget Office.

CONCLUSION

It is now widely agreed that spending cuts and tax increases will be needed to reduce the projected deficits to acceptable levels when the economy has recovered. While prompt action will be needed to achieve desired deficit reductions in the out-years, balancing this consideration against the need to allow sustained recovery will be difficult; some spending cuts and tax increases may have to be put off to permit recovery to gain momentum. An appropriate deficit reduction program requires a multiyear plan--legislated this year--with a balanced mix of tax increases and spending reductions. I hope our recent reports and continued assistance can help the Congress put together such a plan.

APPENDIX TABLE 1. BASELINE BUDGET PROJECTIONS UNDER ALTERNATIVE ECONOMIC ASSUMPTIONS, FISCAL YEARS 1983-1988 (In billions of dollars)

	1983	ns	7 . 1000							
	Base	1984	1985	1986	1987	1988				
		In Billions of Dollars								
High-Growth Path										
Revenues	615	676	742	798	862	933				
Outlays	793	830	904	971	1,041	1,116				
Deficits	178	155	162	172	179	183				
Low-Growth Path										
Revenues	599	636	686	730	777	825				
Outlays	804	868	958	1,032	1,110	1,187				
Deficits	205	232	272	302	333	363				
,	As a Percent of GNP									
High-Growth Path										
Revenues	19.0	18.7	18.7	18.4	18.3	18.1				
Outlays	24.4	23.0	22.8	22.4	22.1	21.7				
Deficits	5.5	4.3	4.1	4.0	3.8	3.6				
Low-Growth Path										
Revenues	18.9	18.7	18.6	18.5	18.4	18.4				
Outlays	25.3	25.5	26.0	26.1	26.3	26.5				
Deficits	6.5	6.8	7.4	7.6	7.9	8.1				

APPENDIX TABLE 2. MAJOR TAX INCREASE OPTIONS, FISCAL YEARS 1984-1988 (In billions of dollars)

Option	1984	1985	1986	1987	1988	Cumulative Five-Year Increase
Repeal Parts of ERTA						
Repeal July 1, 1983 Rate Reduction	30	33	35	38	40	177
Cap Third-Year Tax Rate Cut at \$700	6	7	7	8	9	37
Repeal Indexing		6	17	28	40	90
Initiate New Tax Sources						
10 Percent Value-Added Tax			150 -	200 pe	r year	
Energy Tax			10 -	20 per	year	
Possible Base-Broadening Options	s a/					
Tax Some Employer-Paid Health Insurance	3	5	6	7	9	30
Eliminate Deductibility of State and Local Sales Taxes	1	6	6	7	8	28
Limit Nonbusiness, Non-Investment Interest Deductions to \$10,000	1	2	2	2	2	9
Lengthen Building Depreciation Period to 20 Years	ո <u>b</u> /	2	4	6	8	19
Require Full Basis Adjustment for the Investment Tax Credit	<u>b</u> /	1	2	4	5	12
Tax Nonstatutory Fringe Benefits	1	1	1	2	2	6
Freeze Estate and Gift Tax Credit at Exemption Equivalen of \$275,000	t 	1	1	2	3	6
Social Security Commission Proposal	9	6	9	10	23	57

SOURCE: Congressional Budget Office, <u>Reducing the Federal Deficit:</u>
<u>Spending and Revenue Options</u> (February 1983).

 $[\]underline{a}$ / Assumes January 1, 1984 effective dates.

 $[\]underline{b}$ / Less than \$0.5 billion.

APPENDIX TABLE 3. MAJOR OUTLAY REDUCTION OPTIONS, FISCAL YEARS 1984-1988 (In billions of dollars)

1984	1985	1986	1987		Cumulative Five-Year Savings
4	16	23	19	19	81
2	10	12	2	-6	20
2.9	3.1	3.5	3.7	4.0	18.6
4.2	7.8	11.5	15.3	19.1	57.9
2.0	3.0	3.4	3.8	4.3	16.5
		2.1	4.1	4.6	10.9
0.9	1.1	1.7	2.5	3.4	9.6
11	23	34	46	58	172
0.8	2.4	4.2	6.2	8.3	21.9
2.1	6.0	10.6	15.6	20.7	55.0
	2.9 4.2 2.0 0.9	4 16 2 10 2.9 3.1 4.2 7.8 2.0 3.0 0.9 1.1 11 23	4 16 23 2 10 12 2.9 3.1 3.5 4.2 7.8 11.5 2.0 3.0 3.4 2.1 0.9 1.1 1.7 11 23 34 0.8 2.4 4.2	4 16 23 19 2 10 12 2 2.9 3.1 3.5 3.7 4.2 7.8 11.5 15.3 2.0 3.0 3.4 3.8 2.1 4.1 0.9 1.1 1.7 2.5 11 23 34 46 0.8 2.4 4.2 6.2	1984 1985 1986 1987 1988 4 16 23 19 19 2 10 12 2 -6 2.9 3.1 3.5 3.7 4.0 4.2 7.8 11.5 15.3 19.1 2.0 3.0 3.4 3.8 4.3 2.1 4.1 4.6 0.9 1.1 1.7 2.5 3.4 11 23 34 46 58 0.8 2.4 4.2 6.2 8.3

SOURCE: Congressional Budget Office, <u>Reducing the Federal Deficit:</u>
<u>Spending and Revenue Options</u> (February 1983).